AFTER IMPACT LOCATION - INJURIES SUSTAINED*

1989

AFTER IMPACT LOCATION	INJURY TYPE: NOT INJURED	POSSIBLE	NON INCAPACITATING	INCAPACITATING	KILLED	UNKNOWN INJURY	TOTALS
NOT EJECTED OR TRAPPED	260,537	29,012	9,169	5,129	379	50	304,276
TOTAL EJECTION	744	315	257	466	203	0	1,985
PARTIAL EJECTION	67	95	101	148	55	0	466
TRAPPED	123	106	111	379	154	0	873
UNKNOWN	2,404	615	103	102	5	112	3,341
TOTALS	**263,875**	**30,143**	**9,741**	**6,224**	**796**	**162**	**310,941**

INJURIES SUSTAINED BY CHILDREN UNDER SIX YEARS OF AGE - 1989**

RESTRAINT	INJURY TYPE: NOT INJURED	POSSIBLE	NON INCAPACITATING	INCAPACITATING	KILLED	UNKNOWN INJURY	TOTALS
CHILD SAFETY SEAT USED	4,803	342	48	25	1	1	5,220
OTHER RESTRAINT USED	4,916	334	76	20	3	2	5,351
NO RESTRAINT USED	1,841	352	112	56	11	2	2,374
UNKNOWN RESTRAINT USAGE	198	31	4	6	1	4	244
TOTALS	**11,758**	**1,059**	**240**	**107**	**16**	**9**	**13,189**

* Occupants of automobiles, pickup trucks, truck tractors and other trucks only.

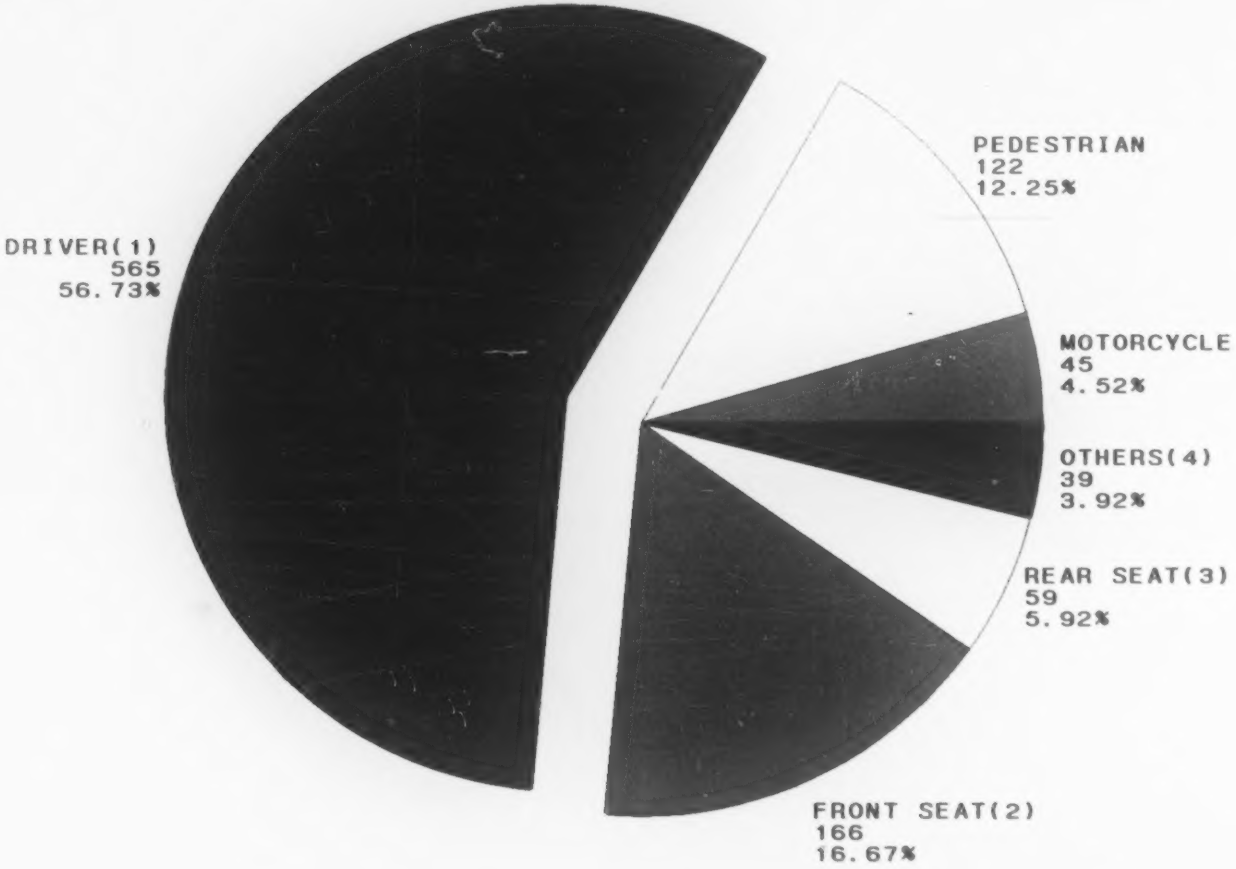
** Includes only children seated inside the vehicle.

There were a total of 310,941 occupants of automobiles and trucks involved in traffic accidents in 1989. Most of these persons (263,875) sustained no injuries. Most persons involved in accidents were not ejected from or trapped in the vehicle (304,276/97.9%). A total of 379 of the occupants not ejected or trapped suffered fatal injuries, comprising 1 out of every 803 of these occupants. Of the 1,985 occupants totally ejected, 203 or 1 in 9 were killed. For the 873 trapped occupants, 154 or about 1 in 6 were killed.

In 1989, 13,189 children under 6 years of age were involved in traffic accidents in South Carolina. This does not include children who were either pedestrians or occupants seated outside the vehicle (such as on the hood of a car). Nearly 40% were restrained by a Federally approved child safety seat. An additional 18% were restrained with a seat belt or seat belt/shoulder harness combination. These figures indicate a reported compliance rate of approximately 58%. Of those children restrained by a child safety seat, only 1 was killed. Three children restrained by a belt were killed and eleven unrestrained children died. The fatality rate for unrestrained children was 1 in every 216 children compared to 1 in every 5,220 children in safety seats and 1 in every 1,784 belted children.

FATALITIES BY SEATING LOCATION

1989



(1) INCLUDES DRIVERS OF ALL AUTOMOBILES, TRUCKS AND BUSES
(2) FRONT SEAT PASSENGERS OF AUTOS, TRUCKS AND BUSES (EXCLUDES DRIVERS)
(3) REAR SEAT PASSENGERS OF AUTOS, TRUCKS AND BUSES
(4) INCLUDES BICYCLISTS, MOPED RIDERS AND PERSONS ON THE OUTSIDE OF THE VEHICLE

PART IV

ALCOHOL & DRUGS

Alcohol-related traffic accidents are responsible for a large portion of reported traffic accidents each year. The percentage of accidents which are alcohol-related increases as the severity of injuries involved increases. On the following pages accident statistics are presented which are based on the probable accident cause as determined by the officers who investigate the traffic accidents. Accidents listed by county and driver involvement are not comparable to any statistics published prior to 1988. In previous years, alcohol and drug involvement was based on a question contained in the Uniform Traffic Accident Report for each driver, "Had been drinking or using drugs". Beginning with 1988, the alcohol and drug accidents are based on the probable cause field which lists 74 causes from which the investigating officer must choose the single probable cause in the accident. Eight of these choices concern alcohol or drug usage.

The data presented here is a summary of these eight alcohol or drug-related probable causes. This data will not include any accidents where the probable cause was something other than alcohol or drugs, even if one of the drivers was intoxicated. For example, if a drunk driver runs a stop sign and this results in a traffic accident, the officer may choose to indicate "disregarding sign or signal" as the probable cause. As a result, alcohol involvement in South Carolina traffic accidents is probably understated in this data.

Despite the restrictive nature in which this data was compiled, these figures indicate alcohol and drugs are important contributors to the frequency and severity of traffic accidents. Some of the key findings in the alcohol/drug data are as follows:

- Alcohol or drug usage was the probable cause in 168 fatal accidents in 1989, resulting in the deaths of 189 persons. Both figures are down from 1988 and represent 18.8% and 19.0% respectively of all fatal accidents and persons killed during the year. These proportions are considerably higher than the 4.1% of accidents which were caused by alcohol or drugs in property damage only accidents.

- Drivers under 21 years of age accounted for 12.6% of all drivers whose age was known in accidents with a probable cause of alcohol or drugs. This is down from 13.7% in in 1988.

- Blood alcohol data is compiled for drivers and pedestrians, who were over 16 years of age and died within 4 hours of a traffic accident. For 1988, the latest year for which complete data is available, 62.2% of all known test results on these victims indicated a positive blood alcohol content.

TRAFFIC ACCIDENTS IN SOUTH CAROLINA WITH A PROBABLE CAUSE OF ALCOHOL OR DRUGS*

1989

	TYPE ACCIDENT				PERSONS	
COUNTY	FATAL	INJURY	PDO	TOTAL	KILLED	INJURED
Abbeville	1	12	23	36	1	24
Aiken	7	96	123	226	8	155
Allendale	0	10	6	16	0	24
Anderson	12	84	100	196	12	132
Bamberg	1	11	14	26	2	26
Barnwell	2	15	20	37	2	23
Beaufort	3	47	79	129	3	76
Berkeley	5	90	119	214	6	143
Calhoun	2	13	14	29	2	23
Charleston	13	250	290	553	14	401
Cherokee	3	62	70	135	5	98
Chester	6	36	30	72	6	61
Chesterfield	2	52	30	84	2	82
Clarendon	0	24	31	55	0	32
Colleton	1	32	51	84	1	55
Darlington	4	82	71	157	6	135
Dillon	4	24	34	62	5	43
Dorchester	6	52	70	128	6	73
Edgefield	0	10	9	19	0	17
Fairfield	1	20	21	42	1	32
Florence	4	118	115	237	5	176
Georgetown	2	61	47	110	2	88
Greenville	8	238	412	658	8	375
Greenwood	1	33	48	82	1	53
Hampton	1	10	13	24	1	22
Horry	8	156	220	384	9	279
Jasper	3	13	20	36	3	18
Kershaw	0	35	59	94	0	47
Lancaster	4	53	47	104	4	89
Laurens	3	39	67	109	3	59
Lee	0	19	13	32	0	35
Lexington	7	120	173	300	9	185
McCormick	0	7	9	16	0	7
Marion	2	33	38	73	2	51
Marlboro	0	24	32	56	0	41
Newberry	2	23	39	64	2	36
Oconee	4	50	65	119	5	68
Orangeburg	5	61	83	149	6	106
Pickens	3	61	99	163	3	111
Richland	12	229	311	552	12	346
Saluda	1	12	20	33	1	21
Spartanburg	12	193	299	504	15	304
Sumter	2	60	89	151	5	104
Union	1	28	33	62	1	52
Williamsburg	2	40	25	67	2	60
York	8	134	130	272	8	201
TOTALS	**168**	**2,872**	**3,711**	**6,751**	**189**	**4,589**

* This chart is not comparable to any published statistics from 1987 and prior years.

DRIVERS INVOLVED IN ACCIDENTS WHERE THE PROBABLE CAUSE WAS ALCOHOL OR DRUGS
AGE AND SEX OF DRIVER
1989

	--- TOTAL ACCIDENTS ---			-- FATAL ACCIDENTS --			-- INJURY ACCIDENTS --			PROPERTY DAMAGE ACCIDENTS		
AGE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE
14 & younger	8	7	1	1	1	0	2	1	1	5	5	0
15	23	10	13	1	1	0	8	4	4	14	5	9
16	101	76	25	2	2	0	44	34	10	55	40	15
17	194	142	52	3	3	0	77	52	25	114	87	27
18	268	198	70	8	4	4	117	86	31	143	108	35
19	296	223	73	6	5	1	128	94	34	162	124	38
20	298	236	62	12	11	1	126	103	23	160	122	38
21	357	283	74	11	8	3	165	128	37	181	147	34
22	322	255	67	8	7	1	147	117	30	167	131	36
23	289	238	51	6	4	2	136	111	25	147	123	24
24	352	276	76	9	8	1	160	127	33	183	141	42
25 to 29	1,775	1,383	392	51	46	5	779	603	176	945	734	211
30 to 34	1,549	1,195	354	29	25	4	643	483	160	877	687	190
35 to 39	1,093	813	280	15	13	2	491	370	121	587	430	157
40 to 44	824	629	195	15	12	3	352	260	92	457	357	100
45 to 49	565	418	147	11	9	2	232	170	62	322	239	83
50 to 54	389	305	84	15	12	3	146	118	28	228	175	53
55 to 59	254	193	61	2	2	0	111	84	27	141	107	34
60 to 64	218	178	40	5	4	1	89	74	15	124	100	24
65 to 69	152	120	32	5	5	0	59	50	9	88	65	23
70 & older	137	101	36	3	2	1	64	48	16	70	51	19
Unknown age	62	54	8	0	0	0	21	18	3	41	36	5
Unknown sex[1]	769	-	-	11	-	-	167	-	-	529	-	-
TOTALS[2]	**10,295**	**7,333**	**2,193**	**229**	**184**	**34**	**4,264**	**3,135**	**962**	**5,740**	**4,014**	**1,197**

[1] Includes drivers whose sex was not recorded on the report, plus hit and run accidents for which driver information was not determined; also includes parked cars with no driver.

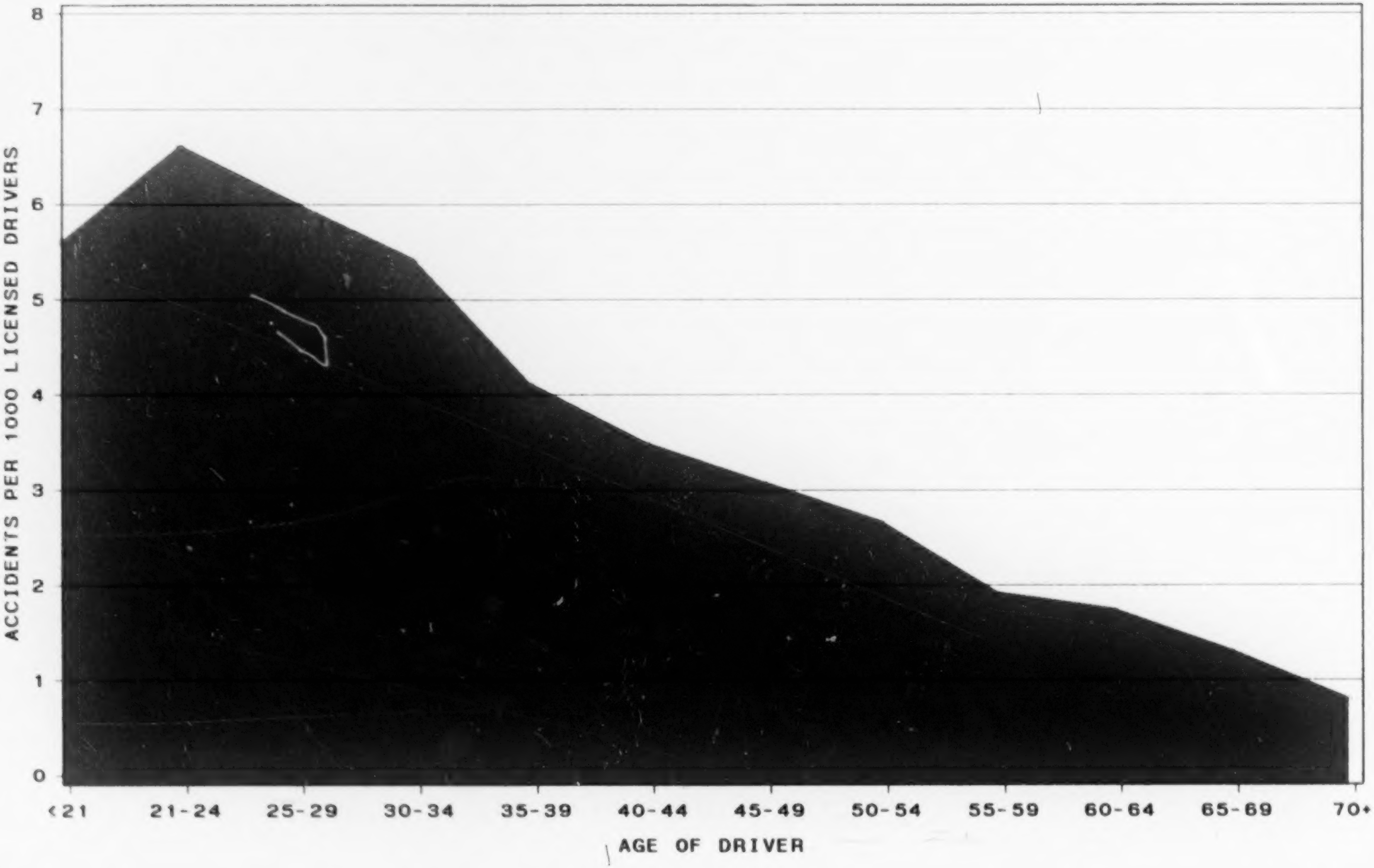
[2] Adding male, female and unknown sex, totals will equal the total for all drivers.

Out of the 10,295 drivers involved in accidents where the probable accident cause was alcohol or drugs and whose gender was known, 77% were males. A total of 1,188 (12.5% of the total) drivers were under the age of 21. In these fatal accidents males comprised 84.4% of all known drivers. There were 33 (15.1%) drivers under age 21 involved in fatal alcohol/drug-related accidents. Male drivers between 21 and 34 years of age accounted for 38.1% of the drivers involved in accidents with a probable cause of alcohol or drugs but comprised only 23.8% of the drivers in all accidents and 16.4% of the state's licensed drivers in 1989. Moreover, for fatal accidents with an alcohol/drug probable cause, male drivers age 21 to 34 accounted for 52.2% of the known drivers.

DRIVERS INVOLVED IN TRAFFIC ACCIDENTS

PROBABLE CAUSE: ALCOHOL OR DRUGS

1989



BLOOD ALCOHOL LEVELS (BAC)
DRIVERS AND PEDESTRIANS IN FATAL ACCIDENTS*
1988

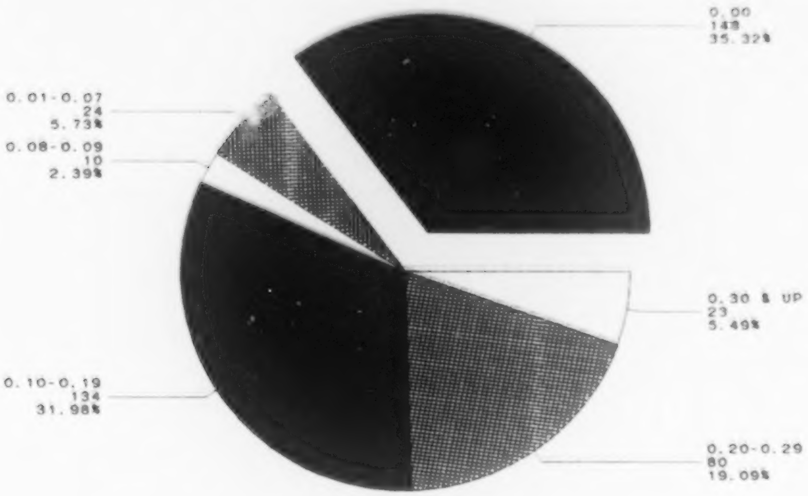
	BAC LEVELS						
COUNTY	0.00	0.01-0.07	0.08-0.09	0.10-0.19	0.20-0.29	0.30 AND UP	TOTAL TESTED
Abbeville	0	0	0	0	1	0	1
Aiken	3	0	0	6	4	0	13
Allendale	1	0	0	0	0	0	1
Anderson	2	0	0	8	4	1	15
Bamberg	0	0	0	3	0	0	3
Barnwell	1	1	0	0	1	0	3
Beaufort	1	1	1	4	1	0	8
Berkeley	5	1	1	6	4	3	20
Calhoun	0	0	0	1	0	0	1
Charleston	8	1	1	6	6	4	26
Cherokee	1	1	0	0	1	0	3
Chester	0	0	0	2	1	0	3
Chesterfield	1	0	0	1	1	1	4
Clarendon	1	0	0	0	0	0	1
Colleton	3	0	0	1	4	0	8
Darlington	4	1	0	4	1	2	12
Dillon	1	0	0	0	0	0	1
Dorchester	4	0	0	1	2	0	7
Edgefield	0	0	0	0	0	0	0
Fairfield	3	0	0	4	3	0	10
Florence	11	0	0	6	1	0	18
Georgetown	5	0	0	5	2	1	13
Greenville	22	5	0	11	7	3	48
Greenwood	1	0	0	2	1	0	4
Hampton	0	0	0	2	0	0	2
Horry	12	2	0	7	1	2	24
Jasper	0	0	0	1	0	0	1
Kershaw	2	0	0	1	1	0	4
Lancaster	5	0	0	3	3	0	11
Laurens	6	0	0	1	0	1	8
Lee	3	1	0	1	0	1	6
Lexington	6	1	2	5	0	0	14
McCormick	0	0	0	0	0	0	0
Marion	4	1	0	2	1	0	8
Marlboro	1	0	1	4	3	0	9
Newberry	1	0	0	0	1	0	2
Oconee	6	0	0	1	0	0	7
Orangeburg	0	2	0	2	3	0	7
Pickens	1	0	0	1	3	0	5
Richland	7	1	3	7	7	2	27
Saluda	0	0	0	3	1	0	4
Spartanburg	13	1	0	12	8	2	36
Sumter	1	2	0	2	1	0	6
Union	0	0	0	1	1	0	2
Williamsburg	0	1	1	1	0	0	3
York	2	1	0	6	1	0	10
TOTALS	**148**	**24**	**10**	**134**	**80**	**23**	**419**

---

* Includes only drivers and pedestrians 16 years of age and older who died within 4 hours of the accident. Only BAC levels for known test results are included. No test results for surviving drivers are included. 1988 is the latest year in which this data is available. The information is provided by the state's coroners, in cooperation with the State Law Enforcement Division.

BLOOD ALCOHOL LEVELS*

1988



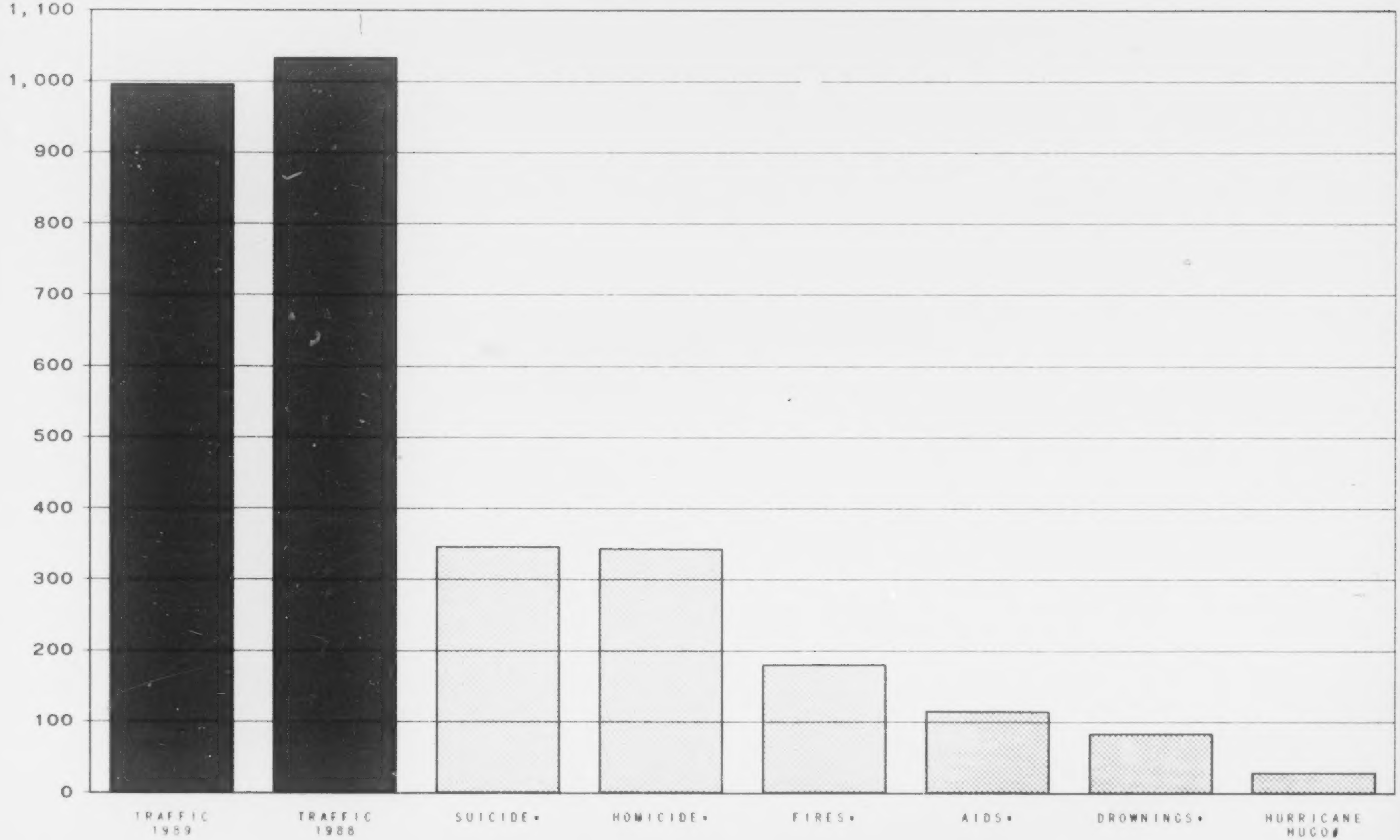
* Includes known test results for drivers and pedestrians 16 years of age and older who died within 4 hours of the accident.

In South Carolina you are presumed to be under the influence when your Blood Alcohol Concentration (BAC) is at a level of 0.10 percent. At this level you are seven times more likely to have an automobile accident than if your BAC were zero (0.00). If your BAC reaches 0.15 percent, your chances of having an accident are 25 times greater.

BAC Levels	Common Effects
0.03	Mild alteration of feelings. Level of impairment is not generally too serious.
0.05	Feelings of relaxation, sedation and/or euphoria. Increase in reaction time. Increased difficulty in performing motor skills. Driving ability and judgment impaired.
0.10	Physical and mental impairment affecting perception and performance. Deterioration in motor coordination. Hearing and speech impaired. Uncoordinated behavior. Legally presumed to be under the influence in South Carolina.
0.15	Serious impairment of physical and mental functioning.Irresponsible behavior. Distorted perception and judgment. Difficulty in standing, walking, and talking.
0.40	Coma results. The person cannot be awakened.
0.60	Death can result from alcohol overdose or accidental choking. At high BAC level, absorption of alcohol continues at a constant rate while oxidation slows because the high BAC causes anesthetization of the heart and lungs. Death occurs when the respiratory and circulatory systems cease to function.

As indicated on the previous page, state law requires that each of the 46 coroners draw blood samples from all drivers and pedestrians over 16 years of age and who die within four hours from injuries sustained in a traffic accident. The graph above shows the blood alcohol levels for the 419 drivers and pedestrians meeting these criteria and whose results were determined by a qualified testing lab.

SOUTH CAROLINA TRAFFIC DEATHS COMPARED TO DEATHS FROM SELECTED OTHER CAUSES



* Source: SC Dept. of Health and Environmental Control (1988 Figures).
# Based on Media Reports.

Definitions*

Alcohol Related Motor Vehicle Accident - Any accident in which either a driver or a non-occupant (such as a pedestrian) had a measurable estimated blood alcohol concentration (BAC) of .01 percent or above.

Driver - An occupant who is in actual physical control of a transport vehicle, or for an out-of-control vehicle, an occupant who was in control until control was lost.

Driver Intention - What the driver intended to do just prior to the first harmful event and before executing and evasive maneuver.

Fatal Injury - Any injury that results in death.

First Harmful Event - The first event in a traffic accident to result in injury or damage.

Harmful Event - An occurrence of injury or damage.

Incapacitating Injury - Any injury, other than a fatal injury, which prevents the injured person from walking, driving or normally continuing the activities he was capable of performing before the injury occurred.

Junction - Either an Intersection or the connection between a driveway access and a roadway other than a driveway access.

Injury - Bodily harm to a person.

Moped** - A moped is a speed-limited motor-driven cycle which may propelled by pedaling.

Motor Vehicle Accident - A transport accident that (1) involves a motor vehicle in transport, (2) is not an aircraft accident or watercraft accident and (3) does not include any harmful event involving a railway train in transport prior to involvement of a motor vehicle in transport.

Non-Incapacitating Evident Injury - Any injury, other than a fatal injury or incapacitating injury, which is evident to observers at the scene of the accident in which the injury occurred.

Nonjunction - A nonjunction is anything that is not an intersection or the connection between a driveway access.

Occupant - Any person who is part of a transport vehicle.

Pedalcyclist - Any occupant of a pedalcycle in transport.

Pedestrian - Any person who is not an occupant.

Possible Injury - Any injury which is reported or claimed which is not a fatal injury, incapacitating injury or non-incapacitating injury.

Probable Cause - The cause or factor which created the accident situation.

Rural Area - Any area which is not within urban areas.

Traffic Accident - A road vehicle accident in which (1) the unstabilized situation originates on a traffic way or (2) a harmful event occurs on a traffic way.

Traffic Unit - A traffic unit is a road vehicle or pedestrian.

Truck Tractor - A truck tractor is a motor vehicle consisting of a single motorized transport device designed primarily for drawing trailers.

Urban Area - An area whose boundaries shall be fixed responsible state and local officials in cooperation with each other and approved by the Federal Highway Administration. Such boundaries are established provisions of Title 23 of the United States Code.

* Source: National Safety Council, Manual on Classification of Motor Vehicle Traffic Accidents, Fifth Edition.

** - A moped is defined in the South Carolina Code of Laws, Section 56-5-165 (1986). In part, this specifies that the "...motor is not to exceed fifty cubic centimeters and produce not more than one and one-half brake horsepower".

Index

- Alcohol/Drugs, Accidents with Probable Cause 12, 64-66
  - Age of Drivers, in 66
  - By County - All, Fatal and Injury Accidents 65
  - Sex of Drivers 66
- Alcohol, Blood Alcohol Levels - 1988 Accidents 68-69
- Bicycle Accidents 52
- Child Safety Seats, Injuries to Occupants Seated in 61, 62
- County, All, Injury and Fatal Accidents 34
- Day of Week, All and Fatal Accidents 24
- Drivers
  - Intentions of 20
  - Licensed by Age and Sex 18
  - Number Licensed in South Carolina 5, 9, 18
  - Out of-State Drivers in South Carolina Accidents 21
  - Traffic Accidents by Age and Sex 19
  - Violations by, in All Accidents 17
- Drugs, Accidents with Probable Cause of See Alcohol
- Economic Loss From Motor Vehicle Accidents
  - By County 59
  - Statewide 5, 9, 59
- Fatal Accidents 5
  - Alcohol/Drugs as the Probable Cause, by County 65
  - Bicycle 52
  - Age and Sex of Driver 19
  - County, Summary of 34
  - First Harmful Event in 14, 15
  - By Month 25
  - Mopeds 51
  - Motorcycles 48, 49, 50
  - Pedestrians 54
  - Probable Cause in 12, 13
  - School Bus 53
  - By Time of Day 23
  - Truck Tractors 57
  - Trains 56
- Fatalities in Traffic Accidents 5, 9, 10, 60
  - By County 34
  - By First Harmful Event 14
  - By Highway District 33
  - On Selected Holidays 26, 27
  - By Jurisdiction 36,37
  - By Probable Cause 12
  - (See Fatal Accidents for Fatalities in Accidents Involving Specific Unit Types)
- First Harmful Event - All, Injury and Fatal Accidents 14, 15
  - Definition of 71
- Highway Districts - Fatalities in 33
- Holidays - Fatal Accidents and Person Killed 26-27
- Injury accidents 5
  - Age and Sex of Driver in 19
  - Alcohol/Drugs as the Probable Cause, by County 65
  - Bicycle 52
  - By County 34
- First Harmful Event in 14
  - Jurisdiction 36-37
  - Moped 51
  - Motorcycle 48-50
  - Pedestrians 55
  - Probable Cause in 12
  - School Bus 53
  - Trains 56
- Injuries 5, 9, 10, 60
  - By Age and Sex 60
  - By Jurisdiction 36-37
  - By County 34
  - By First Harmful Event 14
  - By Probable Cause 12
  - By Severity 60
  - (See Injury Accidents for Injuries Involving Specific Unit Types)
- Licensed Drivers - by Age and Sex 18
- Light Conditions, All and Fatal Accidents 42
- Locale, All Accidents 40
- Mileage Death Rate, US and SC 11
- Month - All and Fatal Accidents 25
- Moped Accidents 51
- Motorcycle Accidents 48-50
- Motor Vehicles
  - Accidents by Type Unit 46
  - Definition of 71
  - Registrations by County 45
- Pedestrians Involved in Traffic Accidents 54-55
- Population
  - All Accidents per 1,00 Population by County) 32
- Fatal Accidents per 100,000 Population (by County) 32
- Probable Cause, All, Injury and Fatal Accidents 12, 13
- Restraints, Injuries by Usage 61
- Road Character, All and Fatal Accidents 43
- Road Defect, All and Fatal Accidents 43
- Rural Traffic Accidents, All and Fatal 31
- Safety Belts (See Restraints)
- School Bus Accidents 53
- Surface Conditions, All and Fatal Accidents 41
- Time of Day, All and Fatal Accidents 23
- Truck Tractor Accidents 57
- Traffic Control, All and Fatal Accidents 42
- Trains, Traffic Accidents Involving 56
- Urban Traffic Accidents, All and Fatal 31
- Uniform Traffic Accident Report (Form TR-310) 6-8
- Vehicle Miles of Travel 5, 9, 10
- Violation, by Drivers Involved in Traffic Accidents 17
- Weather, All and Fatal Accident 41
- Work Zones, Traffic Accidents Occurring In 39, 43

Acknowledgments

The Highway Safety Office of the Department would like to take this opportunity to express sincere appreciation to all persons, agencies, departments and organizations who have contributed to this publication.

The raw data from which this publication was produced was generated from Uniform Traffic Accident Reports for Investigating Officers which were submitted by members of the S.C. Highway Patrol, city police departments, county police agencies and other law enforcement agencies. This office gives special recognition to the above traffic investigative agencies and in doing so cannot forget the support and cooperation of the following organizations within the Department of Highways and Public Transportation: Engineering Division, Motor Vehicle Division, Public Affairs Office, Map Drafting Unit of Planning Division, Data Processing Office and the Traffic Accident Research Section.

The Traffic Records System which produced the traffic collision and other pertinent data for this publication could not have done so without the untiring efforts of the above persons and organizations.

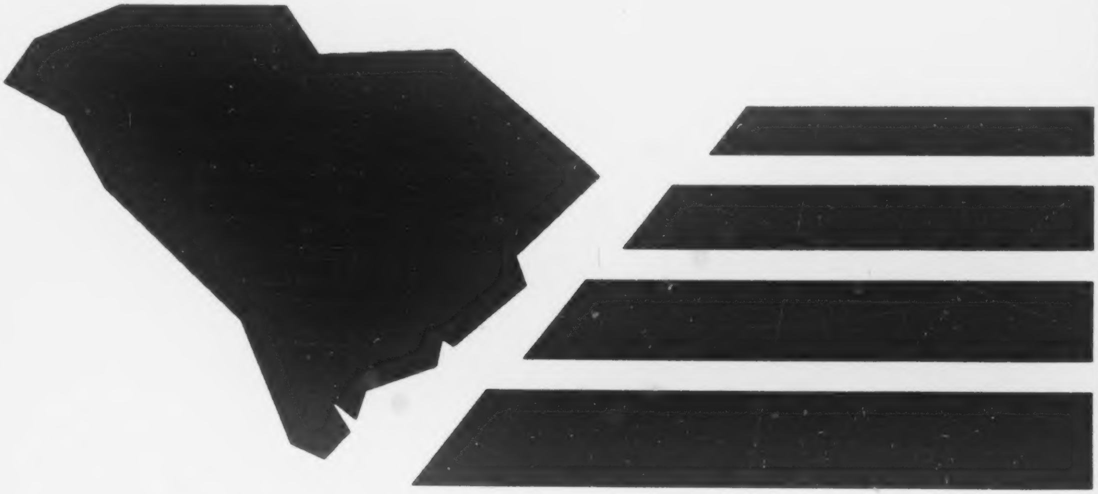
SAFETY EDUCATION SERVICE

HSO

HIGHWAY SAFETY OFFICE

SC DEPARTMENT OF HIGHWAYS & PUBLIC TRANSPORTATION

S7190-2-U



1990
SOUTH CAROLINA TRAFFIC ACCIDENT FACT BOOK

SOUTH CAROLINA
DEPARTMENT OF HIGHWAYS AND PUBLIC TRANSPORTATION
P.O. BOX 191
COLUMBIA, S.C. 29202

My fellow South Carolinians:

In 1990, South Carolina recorded the lowest highway death rate in history -- 2.9 per 100 million miles of travel as compared with 3.0 in 1989.

Our state continued a trend of reductions in deaths and injuries, because of our "Highways or Dieways?" highway safety campaign, increased enforcement by the S.C. Highway Patrol and local police agencies, engineering for better roads, and the efforts of highway safety professionals and various safety organizations. The number of traffic deaths in 1990 decreased by 1.3 percent from 1989, and the number of injuries decreased by 3.1 percent.

Of course, the real credit for these improved records belongs to the motoring public who are becoming increasingly aware of the need to drive responsibly and safely. We are happy to note increasing safety belt usage, as one indication of this awareness.

Our statistics are still too high. Traffic accidents contribute a terrible waste in human and economic resources.

But we continue to be on course through increased public education, engineering, and more and better traffic enforcement.

Please accept the appreciation of this agency for every effort to continue this positive direction, and stick with us in our war against the carnage on our highways.

Robert N. McLellan

Robert N. McLellan
Executive Director

AN EQUAL OPPORTUNITY/AFFIRMATIVE ACTION EMPLOYER

Table of Contents

Part I - GENERAL INFORMATION 4

Quick Facts 5
Uniform Traffic Accident Report 6-8
South Carolina Ten Year Traffic Trends 9
South Carolina Traffic Accidents, Deaths, etc........... 10
SC vs. US Traffic Fatality Rates 11
Traffic Accidents by Probable Cause 12-14
Traffic Accidents by First Harmful Event 15-17

Part II - ACCIDENT CHARACTERISTICS 18

A. The Driver 19
South Carolina Drivers Licensed by Age and Sex 20
Age and Sex of Drivers Involved In Traffic Accidents ... 21
Driver Intentions in All Traffic Accidents 22-23
Out of State Drivers Involved In SC Traffic Accidents .. 24

B. Time 25
Traffic Accidents by Time of Day 26
Traffic Accidents by Day of the Week 27
Traffic Accidents by Month 28
Time Narratives 29
Holiday Traffic Fatalities 30-31
Motor Vehicle Traffic Death Calendar 32-33

C. Location 34
Traffic Accidents Rural/Urban 35
All and Fatal Traffic Accident Population Rates 36
Traffic Deaths by Highway District 37
Traffic Accidents by County 38
Traffic Accidents by Route Category 39
Traffic Accidents by Jurisdiction 40-45
Traffic Accidents by Harmful Event Location 46
Traffic Accidents in Construction Work Zones 47

D. Environment 48
Traffic Accidents by Road Surface Conditions 49

Table of Contents

Traffic Accidents by Weather Conditions 49
Traffic Accidents by Light Conditions 50
Traffic Accidents by Traffic Control Device 50
Traffic Accidents by Road Character 51
Traffic Accidents by Road Defect 51

E. Vehicles 52
Motor Vehicle Registrations by County 53
Unit Types in Traffic Accidents 54
Vehicle Maneuver in All Traffic Accidents 55-56
Traffic Accidents Involving Motorcycles 57-59
Traffic Accidents Involving Mopeds 60-61
Traffic Accidents Involving Bicycles 62-63
Traffic Accidents Involving School Buses 64-65
Traffic Accidents Involving Pedestrians 66-67
Traffic Accidents Involving Railway Trains 68-69
Traffic Accidents Involving Truck Tractors 70-71

Part III - ACCIDENT CONSEQUENCES 72

Economic Loss by County 73
Traffic Accident Injury Profile 74
Traffic Injuries by Restraint Usage 75
After Impact Location - Injuries Sustained 76
Injuries Sustained by Children Under Six Years of Age .. 76
Injuries Sustained by Seating Location 77

Part IV - ALCOHOL & DRUGS IN TRAFFIC ACCIDENTS 78

Alcohol/Drug Accidents by County (Probable Cause) 79
Alcohol/Drug Accidents - Age & Sex of Drivers 80-81
Alcohol/Drug Accidents by Time/Day of Week 82-83
Blood Alcohol Testing in 1989 Fatal Accidents 84-85

Definitions 86

Index 87-88

Acknowledgments 89

PART I

GENERAL INFORMATION

The number of reported traffic accidents in South Carolina declined in 1990 from 1989 by 1.4%. This was the third year in a row traffic deaths declined in South Carolina. Also, motor vehicle travel in South Carolina was up by 4.9% in 1990 over 1989. While the reduction in traffic accidents is certainly a positive sign, the 118,989 reported to the Highway Department represents the third highest total on record. Averaged over the entire year, a traffic accident was reported every 4 minutes and 25 seconds in 1990.

The number of traffic fatalities declined from 996 in 1989 to a total of 983 in 1990, a 1.3% reduction. This is the third year in a row traffic deaths declined from the previous year. The mileage Death Rate (MDR) of 2.9 deaths per hundred million vehicle miles of travel was the lowest in the state's motor vehicle history. Still, the MDR is still more than 38% above the national average of 2.1. One person was killed in a traffic accident in the Palmetto State approximately every 8 hours and 54 minutes in 1990.

The 983 traffic fatalities equal approximately one traffic fatality for every 3,547 Palmetto state residents. In SC, 335 persons under age 25 died in traffic accidents. This represents 34.1% of all traffic fatalities.

Traffic fatalities are the most sever consequence of motor vehicle accidents, but even in non- fatal accidents, the cost in human suffering can be severe. There were 48,338 traffic injuries in 1990. This total is down by 3.1% from 1989. Incapacitating injuries were down more than 6.5% from 1989.

Traffic accidents are responsible for hundreds of millions of dollars in economic losses to South Carolinians each year. Economic losses as estimated here include property damage, medical costs, and lost productivity but do not include intangible costs such as grief and suffering. In 1990, $933 million dollars in estimated losses were incurred; this figure represents a reduction of 3.3% from the previous year.

There are many causes for traffic accidents and these causes vary according to severity of the accident. For example, in 1990, accidents involving fatalities were more than 5 times as likely to have alcohol or drugs indicated as the probable cause than were accidents involving only property damage. In 1990, accidents involving collisions with a fixed object were nearly 4 times as likely to result in fatalities as were accidents involving a collision between two or more motor vehicles in transport.

What is responsible for the tragedy of motor vehicle accidents and what strategies can be employed by concerned individuals in the reduction of accidents in the future? On the following pages, statistics are presented which describe the characteristics, causes, and effects of traffic accidents in South Carolina. It is hoped that this information will be useful to all persons interested in fostering a safer operating environment for motorists in South Carolina.

✓

1990
QUICK FACTS

STATISTIC	NUMBER	% CHANGE FROM 1989
Fatal Accidents	885	-0.9
Injury Accidents	29,776	-3.8
Property Damage Accidents	88,328	-3.4
Total Accidents	118,989	-3.5
Fatalities	983	-1.3
Non-Fatal Injuries	48,337	-3.1
Truck Tractor Fatalities	114	+17.5
Motorcycle Fatalities	50	+11.1
Bicycle Fatalities	28	+86.7
Pedestrian Fatalities	106	-13.1
Railway Train Fatalities	10	-33.3
Moped Fatalities	5	-28.6
School Bus Fatalities	4	+100.0
Economic Loss	$933,000,000	-3.3
Vehicle Miles Traveled	34,377,000,000	+4.9
Roadway Miles Maintained	64,046	-0.1
Motor Vehicle Registrations	2,576,980	+2.0
Licensed Drivers	2,383,792	+1.4
Mileage Death Rate	2.9	-3.3

1 DHPT USE ONLY

ORIGINAL

SOUTH CAROLINA
UNIFORM TRAFFIC ACCIDENT REPORT
(FOR INVESTIGATING OFFICERS)
D.H.P.T. FORM TR-310 Rev. 5/90

☐ Amended - Attach Copy of Original Report

☐ Corrected

# of Units

Page of Pages

2

Date	Time	County	1 - Interstate 4 - Secondary 2 - US Primary 5 - County 3 - SC Primary 6 - Other	**ACCIDENT LOCATION** Route Number and Name if any ON	**AUXILIARY** 0 - Main Line 5 - Spur 8 - Bypass 2 - Alternate 6 - Connection 9 - Other 7 - Business

3

Lane	Ramp 1 - Entrance 2 - Exit	Lane / Ramp Travel Direction N E S W	1 - Interstate 4 - Secondary 2 - US Primary 5 - County 3 - SC Primary 6 - Other	**BASE INTERSECTION** Route Number and Name if any FROM	**AUXILIARY** 0 - Main Line 5 - Spur 8 - Bypass 2 - Alternate 6 - Connection 9 - Other 7 - Business
Distance Offset MILES FEET	Direction N E S W		1 - Interstate 4 - Secondary 2 - US Primary 5 - County 3 - SC Primary 6 - Other	**SECOND INTERSECTION** Route Number and Name if any TOWARD	**AUXILIARY** 0 - Main Line 5 - Spur 8 - Bypass 2 - Alternate 6 - Connection 9 - Other 7 - Business

4

RR Crossing ID	Time Police Notified	Time Police Arrived	Time Ambulance Arrived	City or Town IN	Or if Outside Miles N E S W	For DHPT Use Only MP Grid

5 6 7 8

Unit # Sex Race	Driver or Pedestrian Full Name			Unit # Sex Race	Driver or Pedestrian Full Name		
Birth Date	Street or R.F.D.			Birth Date	Street or R.F.D.		
Residence County	City, State & Zip			Residence County	City, State & Zip		
State Class	Driver License Number			State Class	Driver License Number		
Year Body	Make & Vehicle Identification Number			Year Body	Make & Vehicle Identification Number		
State Year	License Plate Number			State Year	License Plate Number		
Home Telephone #	Owner's Full Name			Home Telephone #	Owner's Full Name		
Bus. Telephone #	Street or R.F.D.			Bus. Telephone #	Street or R.F.D.		
Residence County	City, State & Zip			Residence County	City, State & Zip		
Contrib. to Acc. Yes No	Estimated Speed	Speed Limit	Hazardous Material	Contrib. to Acc. Yes No	Estimated Speed	Speed Limit	Hazardous Material

9

# of Occupants	Vehicle Towed by	Trl. Length	Trl. Width	Trl. Length	Trl. Width	# of Occupants	Vehicle Towed by	Trl. Length	Trl. Width	Trl. Length	Trl. Width

Summons Number	Violation Codes	**B-** 978551	Summons Number	Violation Codes	**B-** 978552

10

Direction of Travel

Unit #1 N E S W

Unit #2 N E S W

NORTH

11

Describe What Happened (Refer to Units by Number):

NOTICE – THE UNIFORM TRAFFIC ACCIDENT REPORT IS FOR STATISTICAL REPORTING PURPOSES ONLY AND REFLECTS THE OFFICER'S BEST KNOWLEDGE, OPINION, AND BELIEF COVERING THE ACCIDENT BUT NO WARRANT IS MADE AS TO THE FACTUAL ACCURACY THEREOF.

SPECIAL USE ONLY	Damage to Property Other Than Vehicle: $	Estimated Amt. of Damage to Unit 1: $	Estimated Amt. of Damage to Unit 2: $

Witness Full Name	Address	Phone	Zip	Age	Sex
Property Owner Name	Address		Zip		

OCCUPANTS

Name	Address	Zip
Name	Address	Zip
Name	Address	Zip
Name	Address	Zip
Name	Address	Zip
Name	Address	Zip

Investigator's Name	Rank	Badge #	Agency Type	Code	Date	Reviewer's Name	Rank

12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 32 33 34 35

SOUTH CAROLINA UNIFORM TRAFFIC ACCIDENT REPORT D.H.P.T. FORM TR-310 Rev. 5-90

SOUTH CAROLINA UNIFORM TRAFFIC ACCIDENT REPORT

MAIL ORIGINAL REPORT TO:

S.C. DEPT. OF HIGHWAYS
& PUBLIC TRANSPORTATION
HIGHWAY SAFETY OFFICE
POST OFFICE BOX 191
COLUMBIA, SC 29202

1

LIGHT

1 - DAYLIGHT
2 - DAWN
3 - DUSK
4 - DARK (LIGHTING UNSPECIFIED)
5 - DARK (STREET LAMPS LIT)
6 - DARK (STREET LAMPS NOT LIT)
7 - DARK (NO LIGHTS)

2

WEATHER

1 - FOG, SMOG
2 - HAIL
3 - HIGH WIND
5 - CLEAR
6 - CLOUDY
7 - RAIN
8 - SNOW, SLEET
9 - OTHER

3

LOCALE

1 - OPEN COUNTRY
2 - RESIDENTIAL
3 - SHOPPING OR BUSINESS
4 - MFG. OR INDUSTRIAL
5 - SCHOOL OR PLAYGROUND
6 - HOSPITAL

4

CHARACTER

1 - STRAIGHT - LEVEL
2 - STRAIGHT - ON GRADE
3 - STRAIGHT - HILLCREST
4 - CURVE - LEVEL
5 - CURVE - ON GRADE
6 - CURVE - HILLCREST

5

CONDITION

1 - DRY
2 - WET
3 - ICY
4 - SLUSHY
5 - SNOWY
6 - MUDDY
7 - DEBRIS
8 - OTHER

6

ROAD DEFECT

0 - NONE
1 - SHOULDER DEFECT
2 - SOFT SHOULDER
3 - LOW SHOULDER
4 - HIGH SHOULDER
5 - RUTS, HOLES, BUMPS
6 - WORN POLISHED TRAVEL SURFACE
7 - ROAD UNDER CONSTRUCTION/ MAINTENANCE
8 - OTHER

7

TRAFFIC CONTROL

1 - STOP SIGN
2 - STOP AND GO SIGNAL
3 - YIELD SIGN
4 - OFFICER OR FLAGMAN
5 - RR CROSSING GATES/LIGHTS
6 - RR FLASHING LIGHTS
7 - NONE
8 - OTHER REGULATORY SIGN
9 - RR CROSSBUCKS ONLY

8

TRAFFIC CONTROL FUNCTIONING

0 - NOT APPLICABLE
1 - YES
2 - NO
3 - UNKNOWN

9

FIRST HARMFUL EVENT

SEE FIRST HARMFUL EVENT CODE LIST ON REVERSE SIDE

10

HARMFUL EVENT LOCATION

SEE HARMFUL EVENT LOCATION CODE LIST ON REVERSE SIDE

11

PROBABLE ACCIDENT CAUSE/FACTOR

SEE PROBABLE ACCIDENT CAUSE/FACTOR CODE LIST ON REVERSE SIDE

TYPE UNIT

01 - AUTOMOBILE
12 - PICKUP TRUCK
13 - TRUCK TRACTOR
14 - OTHER TRUCK
25 - MOTORCYCLE
26 - MOPED
27 - PEDALCYCLE
28 - MINIBIKE
38 - ANIMAL DRAWN VEHICLE
39 - ANIMAL (RIDDEN)
41 - PEDESTRIAN
51 - TRAIN
61 - SCHOOL BUS
62 - PASSENGER BUS
98 - OTHER
99 - UNKNOWN (HIT & RUN ONLY)

VEHICLE USE

01 - PERSONAL
02 - DRIVER TRAINING
03 - CONSTRUCTION/MAINT
04 - AMBULANCE
05 - MILITARY
06 - TRANSPORT PASSENGERS
07 - TRANSPORT PROPERTY
08 - FARM USE
09 - WRECKER OR TOW
10 - POLICE
11 - GOVERNMENT
12 - FIRE FIGHTING
99 - OTHER

ATTACHMENTS

1 - NONE
2 - MOBILE HOME
3 - SEMI TRAILER
4 - UTILITY TRAILER
5 - FARM TRAILER
6 - TRAILER WITH BOAT
7 - CAMPER TRAILER
8 - TOWED MOTOR VEHICLE
9 - PETROLEUM TANKER
A - LOWBOY TRAILER
B - AUTO CARRIER TRAILER
C - OTHER TANKER
D - FLAT BED
E - OTHER
F - TWIN TRAILERS

DRIVER LICENSE RESTRICTIONS NOT COMPLIED WITH

A - CORRECTIVE LENSES
B - SPECIAL RESTRICTED
C - NO INTERSTATE DRIVING
D - NOT TO EXCEED 50 MPH
E - NEIGHBORHOOD ONLY
F - PREVIOUS DUI
G - HAND CONTROLS
H - STEERING KNOB
J - AUTOMATIC TRANSMISSION
K - POWER STEERING/BRAKES
L - OTHER
M - OUTSIDE MIRROR
N - TURN SIGNALS

VISION OBSTRUCTION

0 - NONE
1 - BUILDING
2 - SIGN
3 - VEGETATION
4 - SNOW BANK
5 - HILL
6 - CURVE IN ROAD
7 - VEHICLES
8 - SUNLIGHT, HEADLIGHTS
9 - OTHER (DUST, SMOKE, E.G.)

VEHICLE DEFECT

00 - NONE
01 - BRAKES
02 - STEERING
03 - POWER PLANT
04 - SUSPENSION
05 - TIRES
06 - EXHAUST
07 - LIGHTS
08 - SIGNALS
09 - WINDOWS/WINDSHIELD
10 - RESTRAINT SYSTEMS
11 - WHEELS
12 - TRUCK COUPLING
13 - CARGO
14 - FUEL SYSTEM
97 - OTHER
99 - UNKNOWN

PEDESTRIAN/PEDALCYCLIST ACTION

10 - ENTERING OR CROSSING SPECIFIED LOCATION
11 - ENTERING OR CROSSING ROADWAY
12 - ENTERING OR CROSSING FROM IN FRONT OF OR BEHIND OTHER VEHICLE
20 - WALKING OR RIDING WITH TRAFFIC
30 - WALKING OR RIDING AGAINST TRAFFIC
52 - APPROACHING OR LEAVING A VEHICLE
62 - PUSHING OR WORKING ON VEHICLE
68 - WORKING IN ROADWAY
70 - STANDING
74 - PLAYING IN ROADWAY
75 - LYING AT OR IN LOCATION SPECIFIED
76 - SITTING AT OR IN LOCATION SPECIFIED
97 - OTHER

PEDESTRIAN/PEDALCYCLIST VISIBILITY

0 - NO VISIBILITY
1 - CLOTHING CONTRASTS WITH BACKGROUND
2 - REFLECTIVE MATERIAL OR OBJECT ONLY
3 - CLOTHING CONTRASTS AND REFLECTIVE MATERIAL/OBJECT
4 - OTHER LIGHT SOURCE USED
5 - CLOTHING CONTRASTS AND OTHER LIGHT SOURCE USED
6 - REFLECTIVE MATERIAL AND OTHER LIGHT SOURCE USED
7 - CLOTHING CONTRASTS AND REFLECTIVE MATERIAL AND OTHER LIGHT SOURCE USED
9 - UNKNOWN

ALCOHOL/DRUG TEST TYPE

CODE FIRST POSITION
SCREENING TEST ADMINISTERED

0 - NO
1 - YES

CODE SECOND POSITION

0 - NO TEST
1 - BLOOD TEST
2 - BREATH TEST
3 - URINE TEST
7 - UNABLE TO ADMINISTER
8 - REFUSED TEST
9 - TEST PENDING

OCCUPANT SEAT LOCATION

11 - DRIVER SEAT
12 - CENTER FRONT SEAT
13 - RIGHT FRONT SEAT
21 - LEFT SECOND ROW SEAT
22 - CENTER SECOND ROW SEAT
23 - RIGHT SECOND ROW SEAT
31 - LEFT THIRD ROW SEAT
32 - CENTER THIRD ROW SEAT
33 - RIGHT THIRD ROW SEAT
40 - SLEEPER BERTH
70 - OTHER POSITION IN VEHICLE
71 - ANY POSITION ON OUTSIDE OF VEHICLE

RESTRAINT EQUIPMENT USE

00 - NO SAFETY EQUIPMENT
11 - LAP BELT USED
01 - LAP BELT NOT USED
12 - LAP/SHOULDER HARNESS USED
02 - LAP/SHOULDER HARNESS NOT USED
13 - PASSIVE BELT/HARNESS USED
03 - PASSIVE BELT/HARNESS NOT USED
14 - CHILD/YOUTH RESTRAINT USED
04 - CHILD/YOUTH RESTRAINT NOT USED
15 - AIR BAG DEPLOYED
05 - AIR BAG NOT DEPLOYED
16 - SAFETY BLANKET DEPLOYED
06 - SAFETY BLANKET NOT DEPLOYED
17 - SAFETY PADDING PRESENT
18 - MOTORCYCLE HELMET USED
08 - MOTORCYCLE HELMET NOT USED
99 - UNKNOWN

TEST RESULTS

DRUG TEST RESULTS

CODE FIRST POSITION:

0 - NEGATIVE OR NOT GIVEN
1 - POSITIVE
9 - RESULTS PENDING

ALCOHOL TEST RESULTS

CODE NEXT TWO POSITIONS:

LEVEL OF BLOOD ALCOHOL TEST RESULTS

LOCATION AFTER IMPACT

1 - NOT EJECTED/TRAPPED
2 - TOTAL EJECTION
3 - PARTIAL EJECTION
4 - TRAPPED
5 - UNKNOWN

DRIVER INTENTIONS

SEE DRIVER INTENTIONS CODE LIST ON REVERSE SIDE

ACCIDENT SEVERITY

0 - NO INJURY
1 - POSSIBLE INJURY
2 - NON INCAPACITATING INJURY
3 - INCAPACITATING INJURY
4 - FATAL

VEHICLE MANEUVER

SEE VEHICLE MANEUVER CODE LIST ON REVERSE SIDE

UNIT	SEX	RACE	AGE	SEATING	RESTRAINT	EJECT	INJURY

UNIT NO. 1 12
UNIT NO. 2 13
UNIT NO. 1 14
UNIT NO. 2 15
UNIT NO. 1 16
UNIT NO. 2 17
UNIT NO. 1 18
UNIT NO. 2 19
UNIT NO. 1 20
UNIT NO. 2 21
UNIT NO. 1 22
UNIT NO. 2 23
UNIT NO. 1 24
UNIT NO. 2 25
UNIT NO. 1 26
UNIT NO. 2 27
UNIT NO. 1 28
UNIT NO. 2 29
UNIT NO. 1 30
UNIT NO. 2 31
UNIT NO. 1 32
UNIT NO. 2 33
UNIT NO. 1 34
UNIT NO. 2 35

#9 FIRST HARMFUL EVENT

NON COLLISION
01 OVERTURN
02 FIRE EXPLOSION
03 IMMERSION
04 GAS INHALATION
05 THROWN OR FALLING OBJECT
06 SPILL
09 OTHER NON COLLISION

COLLISION
10 PEDESTRIAN

VEHICLE IN TRANSPORT
20 OTHER
21 HEAD ON
22 REAR END
23 ANGLE
24 SIDESWIPE
25 BACKED INTO
30 PARKED VEHICLE
31 STOPPED VEHICLE
35 RAILWAY TRAIN
40 PEDALCYCLIST
42 MOPED

ANIMAL
44 DOMESTIC ANIMAL WITH RIDER
45 DOMESTICATED
46 WILD OTHER THAN DEER
47 DEER
49 OTHER

FIXED OBJECT
51 HIGHWAY GUARDRAIL
52 IMPACT ATTENUATOR CRASH CUSHION
53 UTILITY POLE
54 LIGHT STANDARD
55 TREE
56 FIRE HYDRANT
57 PIER OR COLUMN
58 OVERHEAD SIGN SUPPORT
59 HIGHWAY SIGN
60 TRAFFIC SIGNAL POST
63 BARRICADE
64 HIGHWAY STRUCTURE, BRIDGE, OVERPASS
65 CULVERT HEADWALL
66 CURBING
67 RETAINING WALL
68 DIVIDER FIN CONCRETE OR STEEL
69 ROCK OR STONE SIDESLOPE
70 EARTH SIDESLOPE
71 BUILDING
72 FENCE OTHER THAN MEDIAN
73 BOULDER
74 DITCH
75 OVERHEAD STRUCTURE, UNDERPASS
76 OTHER FIXED OBJECT
77 TRASH DUMPSTER

OTHER
90 OTHER OBJECT (IE. FOREIGN MATERIAL)
93 ROAD DEFECT
99 OTHER

#10 HARMFUL EVENT LOCATION

ON TRAFFICWAY
ON ROADWAY
01 AT INTERSECTION
02 AT INTERSECTION IN CROSSWALK
03 NONJUNCTION
04 NONJUNCTION IN CROSSWALK
05 ON ISLAND
06 ON ISLAND CROSSWALK
07 INTERCHANGE RAMP
09 OTHER

OFF ROADWAY
21 MEDIAN
22 ISLAND
23 SHOULDER, LEFT
24 SHOULDER, RIGHT
25 DRIVEWAY ACCESS
26 DRIVEWAY ACCESS IN CROSSWALK
27 ROADSIDE, LEFT
28 ROADSIDE, RIGHT
29 SIDEWALK, LEFT
30 SIDEWALK, RIGHT
39 OTHER

OFF TRAFFICWAY
41 OUTSIDE TRAFFICWAY, LEFT
42 OUTSIDE TRAFFICWAY, RIGHT

#11 PROBABLE CAUSE

DRIVER
00 UNDER THE INFLUENCE OF ALCOHOL AND DRUGS
01 UNDER THE INFLUENCE OF DRUGS
02 UNDER THE INFLUENCE OF ALCOHOL
03 FAILED TO YIELD RIGHT OF WAY
04 DISREGARDED TRAFFIC SIGNS SIGNALS
05 EXCEEDED STATED SPEED LIMIT
06 RAN OFF ROAD
07 MADE AN IMPROPER TURN
08 WRONG SIDE OR WRONG WAY
09 FOLLOWED TOO CLOSELY
10 IMPROPER LANE CHANGE
11 IMPROPER BACKING OPERATION
12 IMPROPER PASSING
13 IMPROPER SIGNAL
14 IMPROPER PARKING
15 FELL ASLEEP FAINTED ETC
16 DID NOT COMPLY WITH LICENSE RESTRICTION
17 HANDICAPPED
18 INATTENTION
19 OTHER

ENVIRONMENT
20 SMOKE
21 FOG, SMOG
22 SLEET, HAIL
23 BLOWING SAND SOIL DIRT
24 SEVERE CROSSWINDS
25 RAIN SNOW
26 SIGN OBSTRUCTION
27 VEGETATION OBSTRUCTION
28 SNOW BANK OBSTRUCTION
29 HILL OBSTRUCTION
30 BUILDING OBSTRUCTION
31 CURVE IN ROADWAY
32 ANIMAL IN ROADWAY
39 OTHER

OTHER PERSON (NOT A DRIVER OR PASSENGER)
40 UNDER THE INFLUENCE OF ALCOHOL AND DRUGS
41 UNDER THE INFLUENCE OF DRUGS
42 UNDER THE INFLUENCE OF ALCOHOL
43 FAILED TO YIELD RIGHT OF WAY
44 DISREGARDED TRAFFIC CONTROL DEVICE
45 ILLEGALLY IN ROADWAY
46 BICYCLE VIOLATION
47 CLOTHING NOT VISIBLE
49 OTHER

PASSENGER
51 PASSENGER UNDER THE INFLUENCE OF DRUGS
52 PASSENGER UNDER THE INFLUENCE OF ALCOHOL
53 PASSENGER OBSTRUCTED DRIVER'S VIEW
54 FELL OFF VEHICLE
59 OTHER

ROAD
61 WET
62 ICY
63 SLUSHY
64 DEBRIS
65 RUTS, HOLES, BUMPS
66 ROAD UNDER CONSTRUCTION/MAINTENANCE
67 WORN TRAVEL POLISHED SURFACE
68 OBSTRUCTION
69 TRAFFIC CONTROL DEVICE INOPERATIVE
70 SHOULDERS LOW, SOFT, OR HIGH
79 OTHER

VEHICLE
81 BRAKE
82 STEERING
83 POWER PLANT
84 SUSPENSION
85 TIRES
86 EXHAUST
87 LIGHTS
88 SIGNALS
89 WINDOWS/WINDSHIELD
90 RESTRAINT SYSTEMS
91 WHEELS
92 TRUCK COUPLING
93 CARGO
94 FIRE
96 JACK-KNIFED

OTHER
99 OTHER

#32 & 33 DRIVER INTENTIONS

TRAFFIC UNIT MANEUVERING FOR TRAFFIC CONTROLS INTERSECTIONS OR RAILROAD CROSSINGS
00 NO EXTERNAL CAUSE OF MANEUVER
01 TRAFFIC SIGNAL
02 STOP SIGN
03 YIELD SIGN
04 UNCONTROLLED INTERSECTION
05 CROSSWALK NOT AT INTERSECTION
06 POLICE OFFICER SCHOOL CROSSING GUARD, ETC.
07 RAILROAD CROSSING
08 RAILROAD CROSSING FLASHER OR GATE
09 OTHER CONTROL

TRAFFIC UNIT MANEUVERING OR AVOIDING SOMETHING IN ROADWAY
10 PEDESTRIAN
11 PEDALCYCLE
12 OTHER ROAD VEHICLE (EXCEPT PEDALCYCLE)
13 OTHER VEHICLE
14 ANIMAL
15 FOREIGN OBJECT IN ROADWAY
16 WATER ICE SNOW, OR HAZARDOUS SUBSTANCE ON ROAD
17 ROAD DEFECT
18 ROAD MAINTENANCE OR CONSTRUCTION WORK
19 FIXED OBJECT OR STRUCTURE
20 FOG SMOKE, OR DUST
21 PREVIOUS ACCIDENT
22 OTHER EVENT
23 CURVE IN ROADWAY
24 RESTRICTION IN ROADWAY WIDTH
25 CHANGE IN ROADWAY ALIGNMENT
26 SHOULDER
27 LOOSE GRAVEL IN ROADWAY
28 UNKNOWN OBJECT, EVENT, OR FEATURE

TRAFFIC UNIT MANEUVER BECAUSE OF MECHANICAL FAILURE:
29 TIRE FAILURE
30 STEERING GEAR FAILURE
31 ENGINE FAILURE
32 WINDSHIELD WIPER FAILURE
33 LOAD SPILLED OR DROPPED
34 INVOLVED IN PREVIOUS ACCIDENT
35 OTHER FAILURE

TRAFFIC UNIT MANEUVER FOR OWN INTENDED MOVEMENT:
36 MOVING STRIGHT AHEAD IN PROPER DIRECTION,
INCLUDING CURVES IN ROADWAY
37 MERGE WITH TRAFFIC ON LEFT
38 MERGE WITH TRAFFIC ON RIGHT
39 LEFT TURN
40 RIGHT TURN
41 U TURN
42 ENTER ROADWAY FROM ENTRANCE RAMP ON LEFT
43 ENTER ROADWAY FROM ENTRANCE RAMP ON RIGHT
44 ENTER ROADWAY FROM SHOULDER ON LEFT
45 ENTER ROADWAY FROM SHOULDER ON RIGHT
46 ENTER ROADWAY FROM PARKING AT LEFT CURB
47 ENTER ROADWAY FROM PARKING AT RIGHT CURB
48 LEAVE ROADWAY TO EXIT RAMP ON LEFT
49 LEAVE ROADWAY TO EXIT RAMP ON RIGHT
50 LEAVE ROADWAY TO SHOULDER ON LEFT
51 LEAVE ROADWAY TO SHOULDER ON RIGHT
52 LEAVE ROADWAY TO PARKING AT LEFT CURB
53 LEAVE ROADWAY TO PARKING AT RIGHT CURB
54 LEAVE ROADWAY TO DRIVEWAY ON LEFT
55 LEAVE ROADWAY TO DRIVEWAY ON RIGHT
56 BOARD OR DISCHARGE PASSENGER
80 BACKING

TRAFFIC UNIT MANEUVER AROUND OTHER TRAFFIC UNIT(S):
57 OVERTAKING SUBJECT UNIT ON LEFT
58 OVERTAKING SUBJECT UNIT ON RIGHT
59 CHANGING LANES TO LEFT
60 CHANGING LANES TO RIGHT
61 MERGING FROM LEFT
62 MERGING FROM RIGHT
63 ON RIGHT SIDE OF ROADWAY
64 IN WRONG DIRECTION ON ONE WAY ROADWAY
65 SWERVING TO LEFT
66 SWERVING TO RIGHT
67 SLOWING OR STOPPING
68 STOPPED IN TRAFFIC
69 STOPPED TO BOARD OR DISCHARGE PASSENGER
70 SKIDDING SPINNING, OR YAWING
71 JACK KNIFING
72 TURNING LEFT FROM SAME DIRECTION
73 TURNING LEFT FROM OPPOSITE DIRECTION
74 MAKING U TURN
75 TURNING RIGHT FROM SAME DIRECTION
76 TURNING RIGHT FROM OPPOSITE DIRECTION
77 ENTERING ROADWAY FROM RAMP ON LEFT
78 ENTERING ROADWAY FROM RAMP ON RIGHT
79 ENTERING ROADWAY FROM ROADWAY ON LEFT

#34 & 35 VEHICLE MANEUVER

MOVEMENTS ESSENTIALLY STRAIGHT AHEAD
00 MOVING STRAIGHT, DETAILS UNKNOWN
01 STRAIGHT AHEAD IN PROPER DIRECTION,
INCLUDING CURVES IN ROADWAY
02 OVERTAKING OTHER VEHICLE ON LEFT,
LEFT OF CENTER LINE
03 OVERTAKING OTHER VEHICLE ON LEFT,
RIGHT OF CENTER LINE (USE ON ONE WAY TRAFFIC)
04 OVERTAKING ANOTHER VEHICLE ON RIGHT
05 STRAIGHT AHEAD IN LEFT TURN LANE
06 STRAIGHT AHEAD IN RIGHT TURN LANE
07 CHANGING LANES TO LEFT
08 CHANGING ALNES TO RIGHT
09 MERGING FROM LEFT (ROADWAY NARROWS ON LEFT)
10 MERGING FROM RIGHT (ROADWAY NARROWS ON RIGHT)
11 ON WRONG SIDE OF ROADWAY
12 IN WRONG DIRECTION ON ONE WAY ROADWAY
13 SWERVING TO LEFT
14 SWERVING TO RIGHT
15 SLOWING OR STOPPING
16 SKIDDING LONGITUDINALLY
17 SKIDDING LATERALLY
18 SPINNING OR YAWING
19 JACK KNIFING
20 STOPPED IN TRAFFIC
21 STARTING FROM STOP
22 INCREASED SPEED

TURNING MOVEMENTS
30 TURNING, DETAILS UNKNOWN
31 LEFT FROM LEFT TURN BAY
32 LEFT FROM LEFT (PROPER) LANE
33 LEFT FROM OTHER LANE, LEGAL
34 LEFT FROM OTHER LANE, ILLEGAL
35 LEFT FROM UNKNOWN LANE
36 U TURN
37 RIGHT FROM SPECIAL LANE
38 RIGHT FROM RIGHT (PROPER) LANE
39 RIGHT FROM OTHER LANE, LEGAL
40 RIGHT FROM OTHER LANE, ILLEGAL
41 RIGHT FROM UNKNOWN LANE

ENTERING TRAFFIC LANE
50 ENTERING TRAFFIC LANE, DETAILS UNKNOWN
51 FROM ENTRANCE RAMP ON LEFT
52 FROM ENTRANCE RAMP ON RIGHT
53 FROM SHOULDER ON LEFT
54 FROM SHOULDER ON RIGHT
55 FROM PARKING SPACE AT LEFT CURB
56 FROM PARKING SPACE AT RIGHT CURB
57 FROM DRIVEWAY ON LEFT
58 FROM DRIVEWAY ON RIGHT

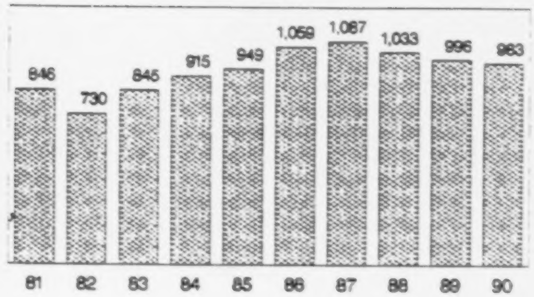
LEAVING TRAFFIC LANE
60 LEAVING TRAFFIC LANE, DETAILS UNKNOWN
61 TO EXIT RAMP ON LEFT
62 TO EXIT RAMP ON RIGHT
63 TO SHOULDER ON LEFT
64 TO SHOULDER ON RIGHT
65 TO PARKING SPACE AT LEFT CURB
66 TO PARKING SPACE AT RIGHT CURB
67 TO DRIVEWAY ON LEFT
68 TO DRIVEWAY ON RIGHT

PARKING ON OR ADJACENT TO TRAFFIC LANE
70 PARKING, DETAILS UNKNOWN
71 ON LEFT SHOULDER
72 ON RIGHT SHOULDER
73 AT LEFT CURB
74 AT RIGHT CURB
75 IN TRAFFIC LANE ON LEFT (RURAL)
76 IN TRAFFIC LANE ON RIGHT (RURAL)
77 DOUBLE PARKED ON LEFT
78 DOUBLE PARKED ON RIGHT

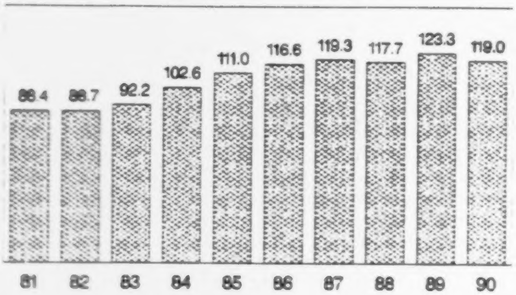
MISCELLANEOUS MOVEMENTS
80 OTHER MISCELLANEOUS, DETAILS UNKNOWN
81 BACKING IN ROADWAY
82 BACKING FROM ANGLE, PARKING ON LEFT
83 BACKING FROM ANGLE, PARKING ON RIGHT
84 BACKING ACROSS TRAFFIC
85 BACKING ON SHOULDER
86 VEHICLE PUSHED BY OTHER VEHICLE
87 VEHICLE PUSHED BY PEDESTRIAN
88 DRIVERLESS VEHICLE IN MOTION
89 NOT IN MOTION (PARKED, ABANDONED, OR STANDING)
99 UNKNOWN

SOUTH CAROLINA
TEN YEAR TRAFFIC TRENDS
1981-1990

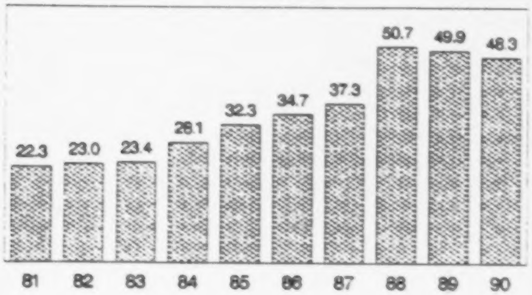
TRAFFIC DEATHS
NUMBER OF DEATHS



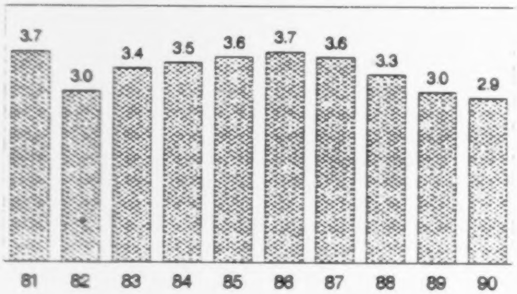
MOTOR VEHICLE ACCIDENTS
THOUSANDS OF ACCIDENTS



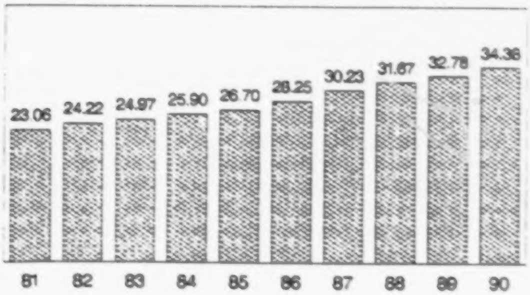
INJURIES
THOUSANDS OF INJURIES



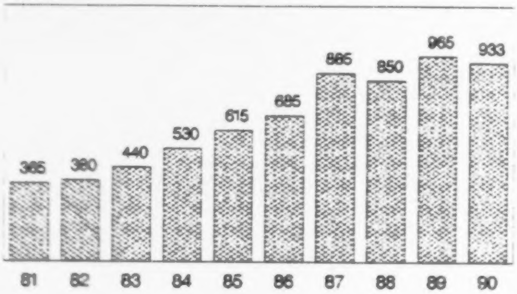
MILEAGE DEATH RATE
DEATHS PER 100 MILLION VEHICLE MILES



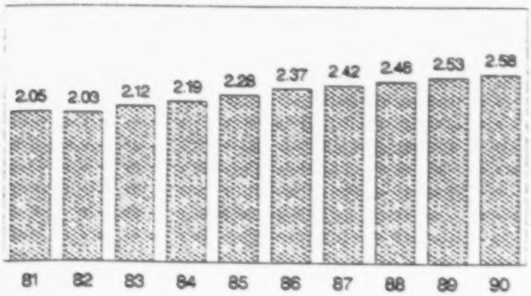
VEHICLE MILES TRAVELED
BILLIONS OF MILES



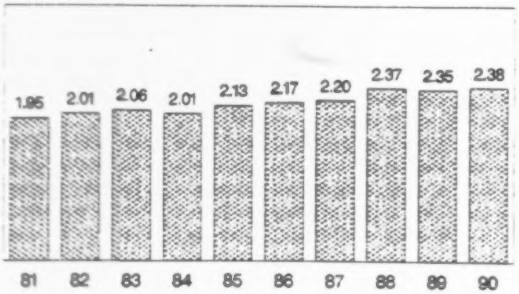
ECONOMIC LOSS
MILLIONS OF DOLLARS



MOTOR VEHICLE REGISTRATIONS
MILLIONS OF VEHICLES



LICENSED DRIVERS
MILLIONS OF DRIVERS



SOUTH CAROLINA

TRAFFIC ACCIDENTS, DEATHS, INJURIES, DEATH RATE AND VEHICLE MILES OF TRAVEL

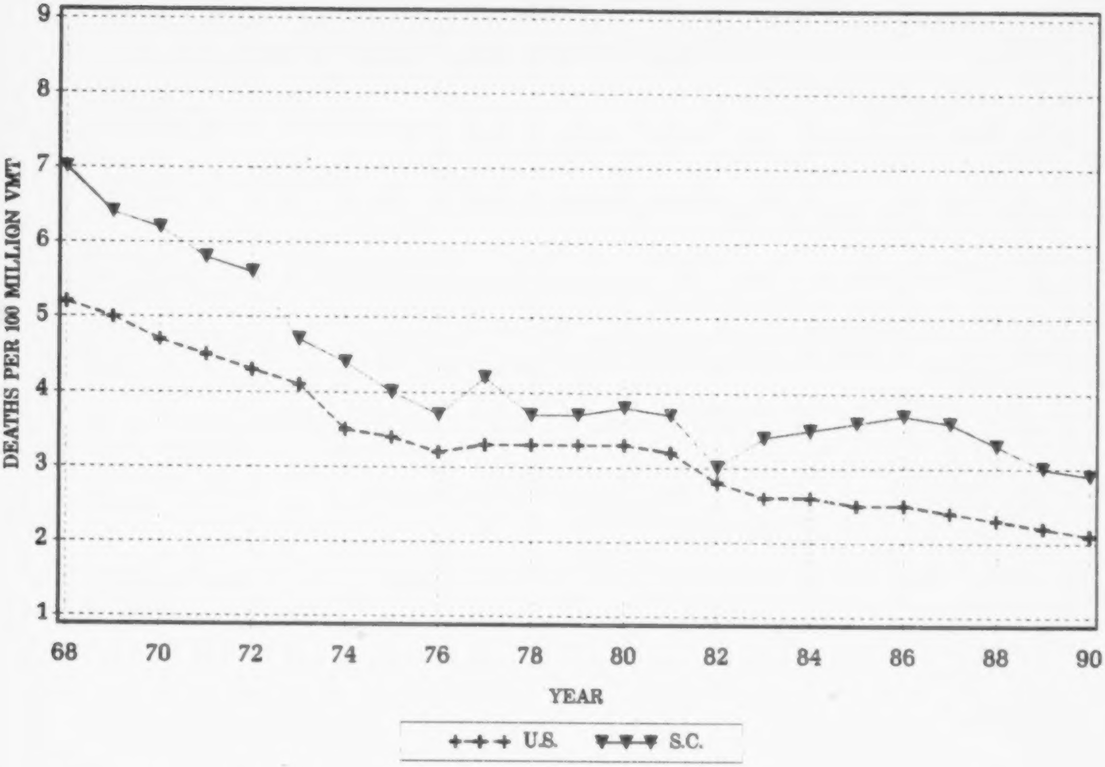
1961 - 1990

YEARS	ACCIDENTS	DEATHS	INJURIES	DEATH RATE*	VMT**
1961	37,291	734	15,103	7.8	9,412
1962	40,519	757	15,851	7.6	9,882
1963	44,233	796	17,652	7.7	10,347
1964	48,419	870	18,271	8.0	10,868
1965	51,389	868	17,608	7.5	11,581
1966	55,697	968	18,598	7.7	12,433
1967	54,747	913	18,892	7.0	13,086
1968	58,197	997	21,459	7.0	14,191
1969	59,033	996	20,203	6.4	15,512
1970	67,808	1,033	19,864	6.2	16,558
1971	74,607	1,023	19,347	5.8	17,763
1972	81,525	1,099	20,283	5.6	19,472
1973	85,071	967	20,440	4.7	20,428
1974	76,986	873	18,863	4.4	20,012
1975	80,740	821	19,407	4.0	20,603
1976	86,944	820	21,201	3.7	21,961
1977	91,485	949	21,382	4.2	22,689
1978	97,883	898	23,223	3.7	24,254
1979	97,394	900	23,815	3.7	24,074
1980	91,016	859	22,599	3.8	22,658
1981	88,425	846	22,355	3.7	23,056
1982	88,798	730	23,019	3.0	24,222
1983	92,277	845	23,458	3.4	24,978
1984	102,617	915	28,135	3.5	25,900
1985	111,077	949	32,388	3.6	26,679
1986	116,573	1,059	34,689	3.7	28,247
1987	119,344	1,087	37,287	3.6	30,227
1988	117,723	1,033	50,713***	3.3	31,672
1989	123,252	996	49,905	3.0	32,781
1990	118,989	983	48,337	2.9	34,377
TOTALS	**2,460,059**	**27,584**	**744,347**	-	**619,923**

* Per 100 million miles of vehicle travel.

** Vehicle Miles Of Travel in millions of miles.

*** This was the first year of the new reporting format. Far more "possible injuries" were reported than in previous years, rendering comparisons with prior years invalid.



MOTOR VEHICLE MILEAGE DEATH RATE
SOUTH CAROLINA VS. U.S.
1968 – 1990

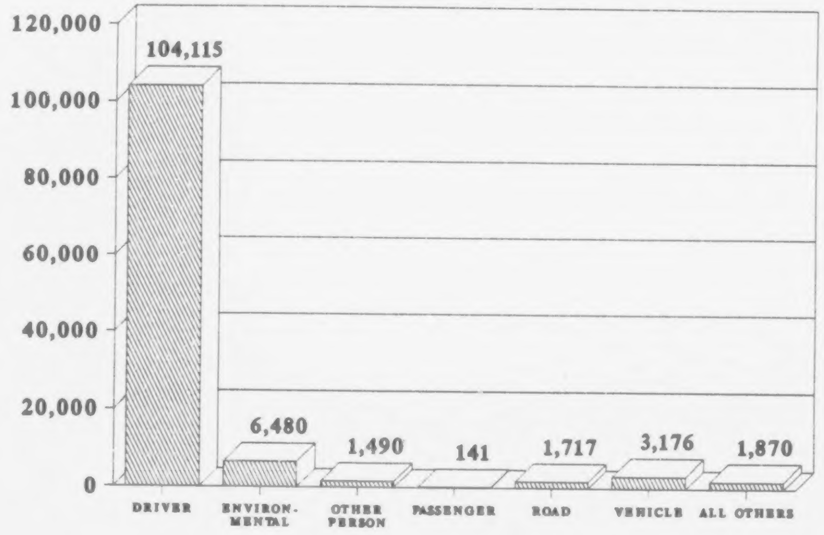
Source For U.S. Data: – Fatal Accident Reporting System.
1990 U.S. Data is preliminary.

From 1967 until 1982, South Carolina's traffic mileage death rate (defined as the number of persons killed per hundred million vehicle miles traveled, also referred to as the MDR), declined from 7.0 to 3.0. At the time, the 1982 rate was the lowest in the state's motor vehicle history. Beginning in 1983, the downward trend reversed and by 1986, the MDR stood at 3.7, the same as in 1978, eight years earlier. Beginning in 1987, the MDR again started to decline and by 1990 reached 2.9. This was the first time an MDR of under 3 was achieved in South Carolina. This improvement was due to a 1.3% reduction in fatalities coupled with a 4.9% increase in mileage traveled. Nationally, preliminary estimates indicate an MDR of 2.1, the lowest ever recorded nationally. Despite a reduction for the fourth straight year, the South Carolina MDR remained 38% higher than the national rate in 1990.

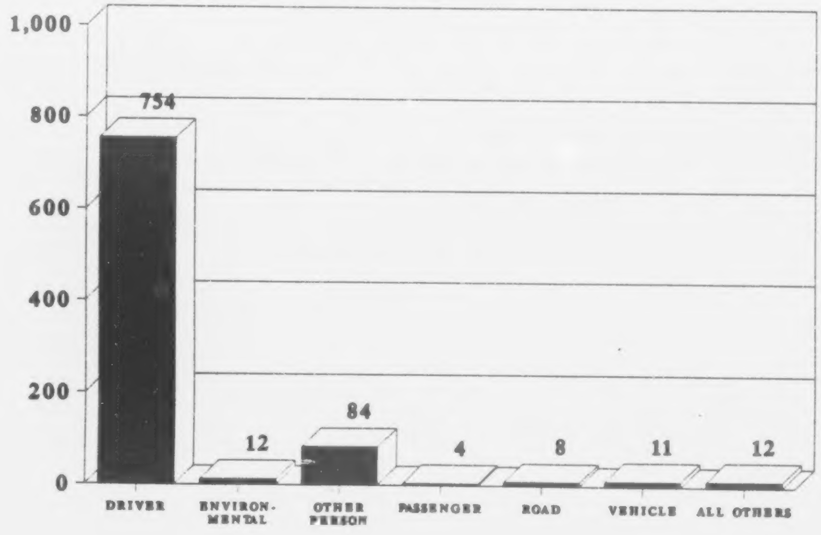
TRAFFIC ACCIDENTS BY PROBABLE CAUSE - 1990

	TYPE ACCIDENT				PERSONS	
	Fatal	Injury	PDO	Total	Killed	Injured
DRIVER						
UNDER INF. ALC. & DRUGS	26	503	693	1,222	26	790
UNDER INF. OF DRUGS	2	90	192	284	2	163
UNDER INF. OF ALCOHOL	161	2,332	2,938	5,431	179	3,838
FAILED TO YIELD R.O.W.	81	6,483	17,315	23,879	92	11,370
DISREGARDED SIGN/SIGNAL	39	2,067	3,524	5,630	43	3,859
EXCEEDED SPEED LIMIT	123	1,757	3,117	4,997	142	2,800
RAN OFF ROAD	82	1,122	2,602	3,806	90	1,610
MADE AN IMPROPER TURN	9	530	2,965	3,504	10	874
WRONG SIDE OR WAY	64	642	1,445	2,151	81	1,227
FOLLOWED TOO CLOSELY	3	2,127	7,433	9,563	3	3,413
IMPROPER LANE CHANGE	9	499	4,363	4,871	9	745
IMPROPER BACKING	3	202	3,094	3,299	5	295
IMPROPER PASSING	15	363	1,601	1,979	16	631
IMPROPER SIGNAL	1	17	87	105	1	43
IMPROPER PARKING	0	43	290	333	0	61
FELL ASLEEP, FAINTED	37	760	987	1,784	39	1,014
DIDN'T COMPLY W/LIC REST.	0	11	8	19	0	11
HANDICAPPED	1	12	39	52	1	34
INATTENTION	65	5,581	19,503	25,149	74	8,798
OTHER	33	1,389	4,635	6,057	37	2,154
ENVIRONMENT						
SMOKE, FOG, SMOG	4	41	123	168	4	68
SLEET, HAIL	0	6	12	18	0	22
BLOWING SAND, SOIL, DIRT	0	10	22	32	0	15
SEVERE CROSSWIND	0	8	29	37	0	8
RAIN, SNOW	4	206	651	861	5	307
SIGN OBSTRUCTION	0	4	10	14	0	10
VEGETATION OBSTRUCTION	0	15	78	93	0	16
SNOW BANK OBSTRUCTION	0	3	4	7	0	3
HILL/BUILDING OBSTRUCTION	0	11	32	43	0	12
CURVE IN ROADWAY	1	15	48	64	1	21
ANIMAL IN ROADWAY	1	452	4,274	4,727	1	586
OTHER	2	87	327	416	2	135
OTHER PERSON						
UNDER INFL. ALC. OR DRUGS	18	133	54	205	19	151
FAILED TO YIELD R.O.W.	16	181	242	439	16	242
DISREGARDED TRF. CONTROL	1	26	45	72	1	42
ILLEGALLY IN ROADWAY	31	228	84	343	31	254
BICYCLE VIOLATION	4	121	34	159	4	131
CLOTHING NOT VISIBLE	7	29	17	53	7	30
OTHER	7	94	118	219	7	102
PASSENGER						
UNDER INFL. ALC. OR DRUGS	0	6	5	11	0	8
PASS. OBST. DRIVERS VIEW	0	2	6	8	0	2
FELL OFF VEHICLE	3	32	7	42	3	36
OTHER	1	35	44	80	1	53
ROAD						
WET	5	235	831	1,071	5	375
ICY, SLUSHY	1	0	9	10	1	0
DEBRIS	0	29	152	181	0	47
RUTS, HOLES, BUMPS	0	22	58	80	0	34
ROAD UNDER CONST./MAINT.	0	10	37	47	0	20
WORN POLISHED SURFACE	0	2	8	10	0	2
OBSTRUCTION IN ROAD	0	14	72	86	0	15
TRAFFIC CONT. INOPERATIVE	1	17	28	46	1	37
SHOULDERS LOW, HIGH, SOFT	1	10	34	45	1	13
OTHER	0	21	120	141	0	30
VEHICLE						
BRAKES	1	358	924	1,283	1	621
STEERING	2	72	140	214	2	97
POWER PLANT	0	49	124	173	0	78
SUSPENSION OR EXHAUST	0	13	28	41	0	21
TIRES	2	135	475	612	2	206
LIGHTS	1	55	92	148	1	83
SIGNALS/WINDOWS/W'SHIELD	0	9	36	45	0	13
RESTRAINT SYSTEMS	0	1	16	17	0	1
WHEELS	1	19	124	144	1	38
TRUCK COUPLING	0	11	53	64	0	16
CARGO	2	41	303	346	2	47
FIRE	0	5	11	16	0	5
JACK-KNIFED	2	14	57	73	2	30
OTHER CAUSES	12	359	1,499	1,870	12	524
TOTALS	885	29,776	88,328	118,989	983	48,337

ALL ACCIDENTS BY PROBABLE CAUSE
1990



FATAL ACCIDENTS BY PROBABLE CAUSE
1990



Probable Cause

Some action (or inaction) by one or more of the drivers was cited as the probable cause in 104,115 of the reported traffic accidents in 1990. This accounted for 87.5% of all probable accident causes, a percentage slightly higher than the 85.3% in 1989. In fact, of the 10 leading probable causes, nine were driver-related. Environmental factors accounted for the next largest category of accident causes with 6,480 or 5.4% of the total. The "Other Person", "Passenger", "Road" and "Vehicle" categories each accounted for less than 3% of all reported traffic accidents in 1990. The top ten probable accident causes in 1990 were as follows: 1) Inattention (25,149); 2) Failure to Yield Right of Way (23,879); 3) Following Too Closely (9,563); 4) Driver - Other (6,057); 5) Disregarded Sign/Signal (5,630); 6) Exceeded Speed Limit (4,997); 7) Driver Under the Influence of Alcohol (5,431); 8) Improper Lane Change (4,871); 9) Animal in Roadway (4,727); and 10) Ran Off the Road (3,806). The "Animal in Roadway" figure represents a 16% increase over 1989, by far the largest percentage increase of the top 10 causes.

For fatal accidents in 1990, some type of driver error was considered the probable cause in 754 of the 885 accidents accounting for 85.2% of all accidents in which someone was killed. This percentage is slightly lower than for all accidents. The specific causes of fatal accidents were quite different from all accidents. The leading probable cause of fatal accidents was "Driver Under the Influence of Alcohol" with 161 or 18.2% of the total. The second leading cause was "Driver Exceeding the Speed Limit" with 123 or 13.9%. Taken together, the three "Driver Under the Influence" causes accounted for 189 or 21.4% of the fatal accidents, more than twice the 9.8% reported for injury accidents and more than 4 times the 4.3% reported in property damage only accidents. The proportion of "Other Person" causes was also sharply higher in fatal accidents. More than 9% of the reported fatal accidents were caused by a person other than a driver of a motor vehicle. Specifically, the "Other Person Illegally in Roadway" (usually a pedestrian) accounted for 3.5% for the fatal accidents and "Other Person Under the Influence of Alcohol or Drugs" accounted for another 2%. All "Road" probable causes accounted for only 0.9% of the fatal accidents; all "Vehicle" causes for only 1.2%.

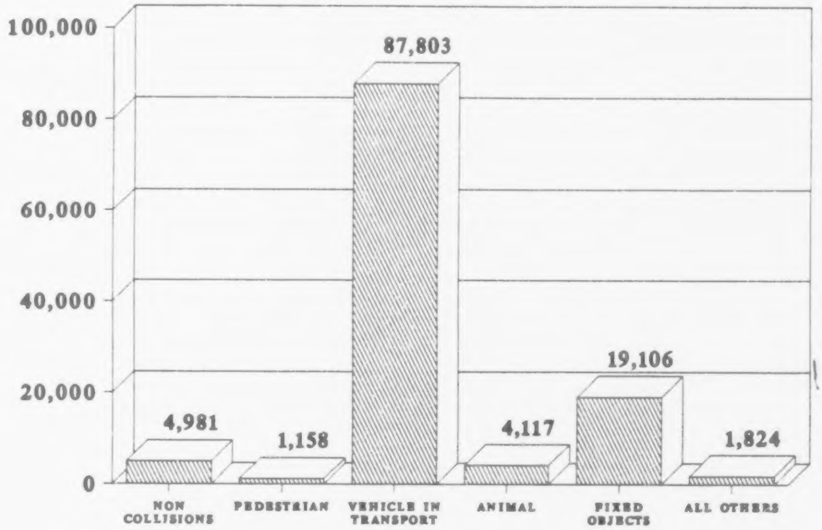
TRAFFIC ACCIDENTS BY FIRST HARMFUL EVENT - 1990

	TYPE ACCIDENT				PERSONS	
	Fatal	Injury	PDO	Total	Killed	Injured
NON-COLLISION						
OVERTURN	66	1,133	1,738	2,937	68	1,636
FIRE/EXPLOSION	0	10	23	33	0	18
IMMERSION	5	49	127	181	5	76
GAS INHALATION	0	3	6	9	0	5
THROWN/FALLING OBJECT	0	29	255	284	0	31
SPILL (MOTORCYCLE)	0	15	74	89	0	18
OTHER NON-COLLISION	9	397	1,042	1,448	9	528
PEDESTRIAN	99	908	151	1,158	102	979
VEHICLE IN TRANSPORT						
OTHER	3	273	722	998	3	517
HEAD ON	104	1,086	1,195	2,385	133	2,344
REAR END	40	7,360	23,785	31,185	46	12,158
ANGLE	201	9,757	27,980	37,938	231	17,611
SIDESWIPE	17	1,389	9,077	10,483	18	2,364
BACKED INTO	0	173	3,060	3,233	0	249
PARKED VEHICLE	1	86	505	592	2	119
STOPPED VEHICLE	0	109	325	434	0	209
RAILWAY TRAIN	8	13	30	51	8	17
PEDALCYCLIST	11	323	65	399	11	344
MOTORCYCLIST	2	70	15	87	2	88
MOPED	0	15	3	18	0	16
ANIMAL						
ANIMAL W/RIDER	0	4	6	10	0	5
DOMESTICATED	2	76	445	523	3	96
WILD, NOT DEER	0	10	73	83	0	12
DEER	1	133	3,252	3,386	1	179
OTHER	0	24	91	115	0	37
FIXED OBJECT						
HIGHWAY GUARDRAIL	10	202	509	721	12	307
IMPACT ATTENUATER	0	7	9	16	0	10
UTILITY POLE	25	695	991	1,711	28	966
LIGHT STANDARD	2	13	31	46	2	14
TREE	124	1,507	2,163	3,794	134	2,060
FIRE HYDRANT	2	29	131	162	2	38
PIER/COLUMN	3	13	32	48	3	17
OVERHEAD SIGN SUPPORT	1	5	9	15	1	7
HIGHWAY SIGN	1	101	589	691	1	127
TRAFFIC SIGNAL POST	1	22	57	80	1	32
BARRICADE	0	11	60	71	0	14
HIGHWAY STR, BR, O'PASS*	9	88	196	293	9	124
CULVERT HEADWALL	9	89	132	230	9	136
CURBING	7	111	445	563	9	143
RETAINING WALL	3	42	125	170	4	52
DIVIDER FIN.	0	21	63	84	0	27
ROCK/STONE SIDESLOPE	0	10	37	47	0	11
EARTH SIDESLOPE	21	422	782	1,225	22	599
BUILDING	2	70	171	243	2	99
FENCE, OTHER THAN MEDIAN	10	175	839	1,024	10	222
BOULDER	0	8	14	22	0	11
DITCH	64	2,055	4,597	6,716	69	2,793
OVERHEAD STR/UNDERPASS**	1	9	22	32	1	10
OTHER FIXED OBJECT	12	206	850	1,068	13	259
TRASH DUMPSTER	0	7	27	34	0	9
OTHER						
OTHER OBJECT	1	61	458	520	1	78
ROAD DEFECT	1	16	59	76	1	22
ALL OTHERS	7	336	885	1,228	7	494
TOTALS	885	29,776	88,328	118,989	983	48,337

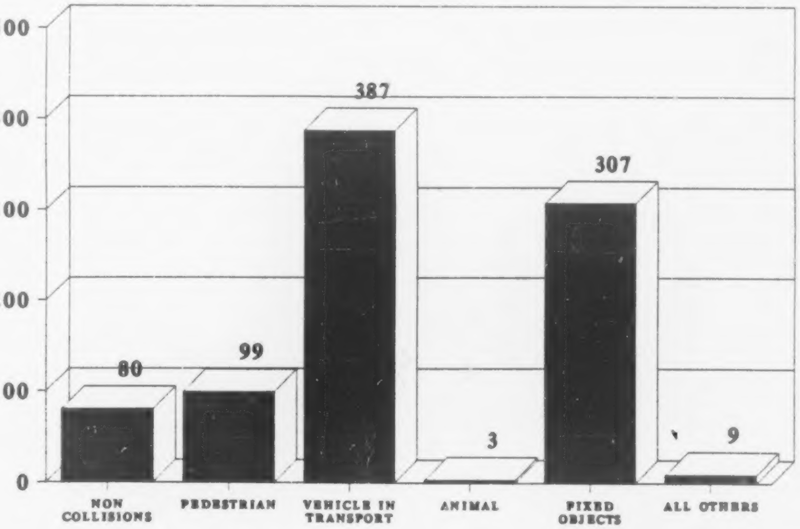
* ABBREVIATION FOR: HIGHWAY STRUCTURE, BRIDGE, OVERPASS

** ABBREVIATION FOR: OVERHEAD STRUCTURE, UNDERPASS

ALL ACCIDENTS BY FIRST HARMFUL EVENT
1990



FATAL ACCIDENTS BY FIRST HARMFUL EVENT
1990



First Harmful Event

The first harmful event (FHE) in a traffic accident is defined by the National Safety Council as the first occurrence of injury or damage in an accident. In 1990, the FHE in 87,803 of the 118,989 reported traffic accidents (73.8%) involved some type of collision between two or more vehicles in transport. The top three FHEs, all involving collisions between two or more vehicles in transport, were "angle collision", 37,938 (31.9%); "rear end collision", 31,185 (26.2%); and "sideswipe collision", 10,483 (8.8%). Combined, these three accounted for 66.9% of all reported accidents. The second largest category of FHEs involved collisions between a motor vehicle in transport and a fixed object with a total of 19,106 (16.1%) reported accidents. The leading object struck was a ditch with 6,716 (5.6%). The third leading category of FHEs was the non-collision with a total of 4,981 (4.2%) reported accidents.

The category with the largest percentage increase from 1989 involved accidents where a motor vehicle struck an animal. These accidents climbed from from 3,547 (2.9%) in 1989 to 4,117 (3.5%) in 1990, an increase of 16.1%. This entire increase can be accounted for by collisions involving a motor vehicle and a deer. These accidents increased by **21.2%** from 1989 to a total of 3,386 and accounted for 2.8% of all reported accidents in 1990, making this the sixth largest FHE.

For fatal accidents, collisions between two or more motor vehicles in transport accounted for a substantially smaller percentage (43.7%) than for property damage only accidents (75.6%). Accidents involving a "collision with a fixed object" and "collision with a pedestrian" accounted for a substantially greater percentage of the fatal accidents (34.7% and 11.2%, respectively) than for property damage only accidents (14.6% and 0.2%). The leading FHE in fatal accidents was the "angle collision" with 201 (22.7%). This was followed by "collision with a tree" with 124 (14.0%); "head on collisions" with (11.8%); and "collision with pedestrian" 99 (11.2%). The 99 fatal accidents in the "collision with pedestrian" category accounted for 8.5% of the reported total in this FHE type. By comparison, only 201 (0.5%) of the "angle collisions" and 17 (0.2%) of the "sideswipe collisions" resulted in fatalities.

PART II
ACCIDENT CHARACTERISTICS

There are many characteristics associated with traffic accidents. Patterns in these characteristics can provide insight into the causes of accidents and may ultimately lead to effective countermeasures for reducing the number of accidents which occur and minimizing the severity of those which still do occur. The data provided on the following pages may raise interesting questions among those interested in highway safety. These questions may in turn lead to research which addresses a particular accident characteristic. Here are some examples of traffic accident characteristics for 1990:

A. Driver

- Male drivers between 20 and 24 years of age are overrepresented in fatal collisions.
- Nearly two-thirds of all drivers involved in traffic accidents were not charged with any violation.
- The leading traffic violation in 1990 was "Speeding, Less Than 10 MPH Over the Limit", accounting for 27.6% of the violations charged.

B. Time

- Fatal accidents occurred more often at night than in the daytime.
- The month of May had the most fatal accidents in 1990.
- More than twice as many fatal accidents occurred on Saturday as on Wednesday in 1990.

C. Location

- More fatal accidents (34.4% of the total) occurred on secondary routes than on any other route category.
- Only 6,472, less than 5.4% of all traffic accidents occurred on the interstates. Slightly more than 7% (63 out of 885) of the fatal accidents occurred on the Interstates.

D. Environment

- The vast majority (83.7%) of all traffic accidents occurred during clear or cloudy weather conditions.
- More than 8 out of 10 fatal accidents occurred on a dry road surface.

E. Vehicles

- Automobiles constituted three-fourths of all units involved in traffic accidents during 1990.
- A total of 8.5% the traffic accidents involving railway trains, 7.7% involving pedestrians, 3.0% involving motorcycles, 3.2% involving bicycles, 4.3% involving mopeds and 2.1% involving truck tractors resulted in fatalities.

This is just a sample of some of the thought-provoking observations evident in the statistics presented on the following pages. These and other patterns indicated in the data, may merit additional research.

A. The Driver

Numerous decisions are required of drivers in the operation of a motor vehicle. All too often, poor judgment, inattention, carelessness or even deliberate intent on the part of a driver results in a dangerous driving decision, which leads to a traffic accident. The probable cause in over 87% of all reported traffic accidents was driver-related in 1990. Often, the officer investigating the accident will issue a citation to one or more of the drivers involved in traffic accidents. Listed below are the top 10 driver violations charged to drivers involved in reported traffic accidents during 1990:

	Violation	#	%
1.	Speeding < 10 MPH Over The Limit	21,670	27.6
2.	Failure To Yield Right Of Way	17,753	22.6
3.	Following Too Closely	6,181	7.9
4.	Driving Under Influence	5,531	7.0
5.	Disregarding Sign Or Signal	3,881	4.9
6.	Changing Lane Unlawfully	3,081	3.9
7.	Improper Turning Movement	2,327	3.0
8.	Drivers License Violations	1,883	2.4
9.	Backing Improperly	1,744	2.2
10.	Improper Passing	1,214	1.6
11.	All Other Violations	13,302	16.9
	TOTAL	78,567	100.0

Note: More than one violation can be charged to a driver. A total of 144,368 drivers were not charged with any violation.

Another group of driver violations which contributed to traffic accidents in 1990 involved non-compliance with drivers license restrictions. The top five restrictions not complied with by drivers involved in traffic accidents in 1990 are as follows (A citation was not necessarily issued for these, but the non-compliance did contribute to the accident occurrence.):

Restriction	#	%
1. Corrective Lens	1,780	41.4
2. Previous DUI	485	11.3
3. Special Restricted License	369	8.6
4. Not to Exceed 55 mph	24	0.5
5. Neighborhood Only	20	0.5
6. All Others	1,622	37.7
TOTAL	4,300	100.0

Enumerated on the following pages are the number of licensed drivers by age and sex, and the number of drivers involved in accidents by age and sex. Based on the figures indicated in these tables, nearly 1 out of every 5 (18.6%) licensed, male drivers between the ages of 15 and 24 years of age was involved in an accident in 1990. Just over 1 in 8 (12.8%) female drivers the same age were involved in an accident. For the entire licensed population, approximately one out of every 11 drivers was involved in an accident during the year. One out of every 810 males ages 15 to 24 was involved in a fatal accident. This was a considerable improvement over the 1989 figure of 1 in 768. This compares to 1 out of every 1,798 licensed drivers in general.

SOUTH CAROLINA DRIVERS LICENSED BY AGE AND SEX*
1990

AGE	MALE	(%)	FEMALE	(%)	TOTAL	(%)
14@	64	0.0	9	0.0	73	0.0
15	6,277	0.3	4,617	0.2	10,894	0.5
16	14,636	0.6	11,588	0.5	26,224	1.1
17	18,750	0.8	15,451	0.6	34,201	1.4
18	21,248	0.9	18,561	0.8	39,809	1.7
19	24,072	1.0	22,080	0.9	46,152	1.9
20	25,305	1.1	23,878	1.0	49,183	2.1
21	24,869	1.0	23,738	1.0	48,607	2.0
22	24,287	1.0	24,014	1.0	48,301	2.0
23	25,279	1.1	24,911	1.0	50,190	2.1
24	25,923	1.1	26,015	1.1	51,938	2.2
25-29	143,312	6.0	147,953	6.2	291,265	12.2
30-34	140,058	5.9	147,654	6.2	287,712	12.1
35-39	131,350	5.5	138,547	5.8	269,897	11.3
40-44	122,108	5.1	124,689	5.2	246,797	10.4
45-49	94,661	4.0	93,668	3.9	188,329	7.9
50-54	74,691	3.1	74,795	3.1	149,486	6.3
55-59	66,646	2.8	67,034	2.8	133,680	5.6
60-64	62,016	2.6	62,004	2.6	124,020	5.2
65-69	57,515	2.4	57,671	2.4	115,186	4.8
70+	85,749	3.6	86,099	3.6	171,848	7.2
TOTAL	1,188,816	49.9	1,194,976	50.1	2,383,792	100.0

*As of 1/11/91

@Moped License Only

ALL REPORTED ACCIDENTS
AGE AND SEX OF DRIVER
1990

AGE	--- TOTAL ACCIDENTS ---			-- FATAL ACCIDENTS --			-- INJURY ACCIDENTS --			PROPERTY DAMAGE ACCIDENTS		
	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE
14 & younger	245	174	71	8	4	4	86	63	23	151	107	44
15	2,631	1,554	1,077	5	2	3	695	397	298	1,931	1,155	776
16	5,700	3,410	2,290	27	17	10	1,458	831	627	4,215	2,562	1,653
17	6,927	4,308	2,619	40	27	13	1,820	1,089	731	5,067	3,192	1,875
18	7,825	4,910	2,915	47	39	8	2,032	1,251	781	5,746	3,620	2,126
19	8,026	5,024	3,002	43	36	7	2,037	1,274	763	5,946	3,714	2,232
20	7,270	4,467	2,803	32	25	7	1,967	1,221	746	5,271	3,221	2,050
21	7,016	4,314	2,702	38	30	8	1,821	1,091	730	5,157	3,193	1,964
22	6,443	3,872	2,571	34	20	14	1,676	1,020	656	4,733	2,832	1,901
23	6,234	3,759	2,475	41	34	7	1,592	968	624	4,601	2,757	1,844
24	6,009	3,617	2,392	40	30	10	1,534	905	629	4,435	2,682	1,753
25 to 29	29,954	17,646	12,308	199	151	48	7,597	4,348	3,249	22,158	13,147	9,011
30 to 34	24,674	14,273	10,401	153	126	27	6,210	3,509	2,701	18,311	10,638	7,673
35 to 39	20,914	12,085	8,829	137	99	38	5,157	2,890	2,267	15,620	9,096	6,524
40 to 44	16,816	9,872	6,944	123	95	28	4,193	2,347	1,846	12,500	7,430	5,070
45 to 49	11,771	7,125	4,646	71	57	14	2,884	1,665	1,219	8,816	5,403	3,413
50 to 54	8,912	5,451	3,461	70	50	20	2,092	1,201	891	6,750	4,200	2,550
55 to 59	7,608	4,753	2,855	49	45	4	1,859	1,089	770	5,700	3,619	2,081
60 to 64	6,631	4,171	2,460	43	32	11	1,565	930	635	5,023	3,209	1,814
65 to 69	5,956	3,678	2,278	34	28	6	1,446	871	575	4,476	2,779	1,697
70 & older	9,071	5,580	3,491	62	48	14	2,282	1,391	891	6,727	4,141	2,586
Unknown age	582	487	95	0	0	0	130	100	30	452	387	65
Unknown sex[1]	10,128	-	-	30	-	-	1,463	-	-	8,635	-	-
TOTALS[2]	**217,343**	**124,530**	**82,685**	**1,326**	**995**	**301**	**53,596**	**30,451**	**21,682**	**162,421**	**93,084**	**60,702**

[1] Includes drivers whose sex was not recorded on the report, plus hit and run accidents for which driver information was not determined; also includes parked cars with no driver.

[2] Adding male, female and unknown sex, totals will equal the total for all drivers.

Out of the 207,215 drivers involved in all traffic accidents and whose gender was known, 60.1% were males. For property damage only accidents, males accounted for 60.5% of the known drivers, but in fatal accidents males comprised 76.8% of all drivers. More than 18.5% of all drivers involved in fatal accidents were male drivers between the ages of 17 and 24. This group of drivers comprised just under 8% of all licensed drivers in 1990. By comparison, female drivers aged 17 to 24 were involved in 5.7% of the fatal accidents and accounted for 7.5% of the licensed drivers.

DRIVER INTENTIONS IN ALL ACCIDENTS

1990

INTENTION	Number	Percentage
TRAFFIC UNIT MANEUVERING FOR TRAFFIC CONTROLS, INTERSECTIONS OR RAILROAD CROSSINGS:		
No External Cause of Maneuver	13,259	6.1
Traffic Signal	4,660	2.1
Stop Sign	3,700	1.7
Yield Sign	691	0.3
Uncontrolled Intersection	184	0.1
Crosswalk Not At Intersection	19	0.0
Police Officer, School Crossing Guard, Etc.	132	0.1
Railroad Crossing	112	0.1
Railroad Crossing Flasher Or Gate	93	0.0
Other Control	596	0.3
TRAFFIC UNIT MANEUVERING OR AVOIDING SOMETHING IN ROADWAY:		
Pedestrian	210	0.1
Pedalcycle	97	0.0
Other Road Vehicle (Except Pedalcycle)	355	0.2
Other Vehicle	1,608	0.7
Animal	713	0.3
Foreign Object In Roadway	228	0.1
Water, Ice, Snow or Hazardous Substance in Road	142	0.1
Road Defect	23	0.0
Road Maintenance or Construction Work	45	0.0
Fixed Object or Structure	34	0.0
Fog, Smoke, or Dust	159	0.1
Previous Accidents	144	0.1
Other Event	342	0.2
Curve in Roadway	180	0.1
Restriction in Roadway Width	7	0.0
Change in Roadway Alignment	18	0.0
Shoulder	69	0.0
Loose Gravel in Roadway	10	0.0
Unknown Object, Event, or Feature	598	0.3
TRAFFIC UNIT MANEUVER BECAUSE OF MECHANICAL FAILURE:		
Tire Failure	115	0.1
Steering Gear Failure	184	0.1
Engine Failure	209	0.1
Windshield Wiper Failure	124	0.1
Load Spilled or Dropped	55	0.0
Involved in Previous Accident	83	0.0
Other Failure	469	0.2
TRAFFIC UNIT MANEUVER FOR OWN INTENDED MOVEMENT:		
Moving Straight Ahead in Proper Direction	102,296	47.1
Merge with Traffic on Left	1,090	0.5
Merge with Traffic on Right	929	0.4
Left Turn	23,378	10.8
Right Turn	7,047	3.2
U Turn	472	0.2
Enter Roadway From Entrance Ramp on Left	162	0.1
Enter Roadway From Entrance Ramp on Right	595	0.3

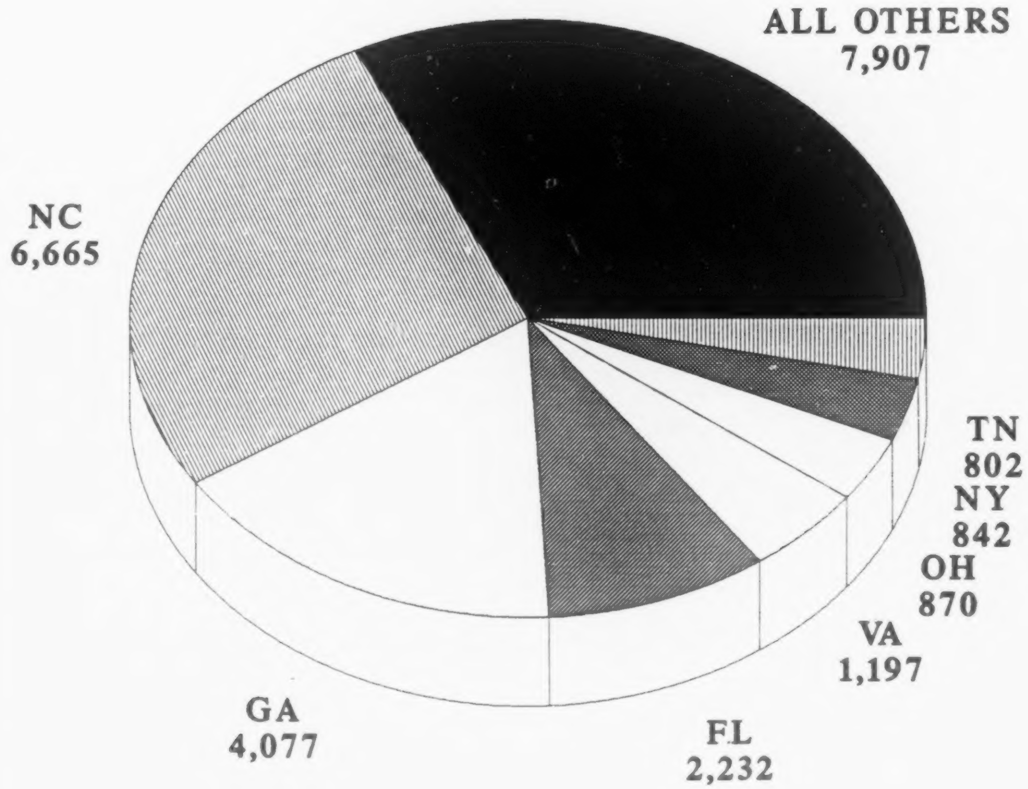
DRIVER INTENTIONS IN ALL ACCIDENTS

1990 (cont.)

INTENTION	Number	Percentage
TRAFFIC UNIT MANEUVER FOR OWN INTENDED MOVEMENT (cont.):		
Enter Roadway From Shoulder on Left	295	0.1
Enter Roadway From Shoulder on Right	933	0.4
Enter Roadway From Parking at Left Curb	115	0.1
Enter Roadway From Parking at Right Curb	391	0.2
Leave Roadway To Exit Ramp on Left	39	0.0
Leave Roadway To Exit Ramp on Right	153	0.1
Leave Roadway To Shoulder on Left	206	0.1
Leave Roadway To Shoulder on Right	365	0.2
Leave Roadway To Parking at Left Curb	46	0.0
Leave Roadway To Parking at Right Curb	142	0.1
Leave Roadway To Driveway on Left	447	0.2
Leave Roadway To Driveway on Right	339	0.2
Board or Discharge Passenger	226	0.1
Backing	4,270	2.0
TRAFFIC UNIT MANEUVER AROUND OTHER TRAFFIC UNIT(S):		
Overtaking Subject Unit on Left	1,947	0.9
Overtaking Subject Unit on Right	969	0.4
Changing Lanes to Left	2,058	0.9
Changing Lanes to Right	2,279	1.0
Merging From Left	165	0.1
Merging From Right	260	0.1
On Right Side of Roadway	255	0.1
In Wrong Direction on One Way Roadway	102	0.0
Swerving To Left	1,001	0.5
Swerving To Right	924	0.4
Slowing or Stopping	13,649	6.3
Stopped in Traffic	15,834	7.3
Stopped To Board or Discharge Passenger	331	0.2
Skidding, Spinning, or Yawing	1,670	0.8
Jack Knifing	27	0.0
Turning Left From Same Direction	645	0.3
Turning Left From Opposite Direction	585	0.3
Making U Turn	89	0.0
Turning Right From Same Direction	307	0.1
Turning Right From Opposite Direction	78	0.0
Entering Roadway From Ramp on Left	32	0.0
Entering Roadway From Ramp on Right	175	0.1
Entering Roadway From Roadway on Left	358	0.2
TOTAL	217,343	100.0

There are a total of eighty-one (81) categories of Driver Intentions that can be assigned to a driver involved in a traffic accident in South Carolina. In 1990, the top five categories accounted for more than three-fourths (77.6%) of all drivers involved in traffic accidents during the year. These include: "Moving Straight Ahead in Proper Direction" by 102,296 drivers or 47.1% of the total; followed by "Left Turn" with 23,378 (10.8%); "Stopped in Traffic", 15,834 (7.3%); "Slowing or Stopping", 13,649 (6.3%); and "No External Cause of Maneuver" with 13,259 (6.1%).

OUT OF STATE DRIVERS
IN SC TRAFFIC ACCIDENTS
1990



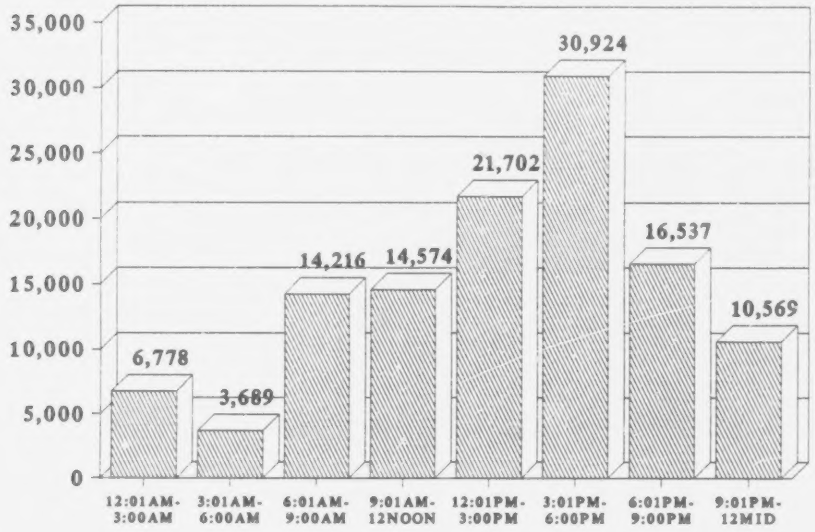
SOUTH CAROLINA DRIVERS COMPRISED
179,837 DRIVERS

B. Time

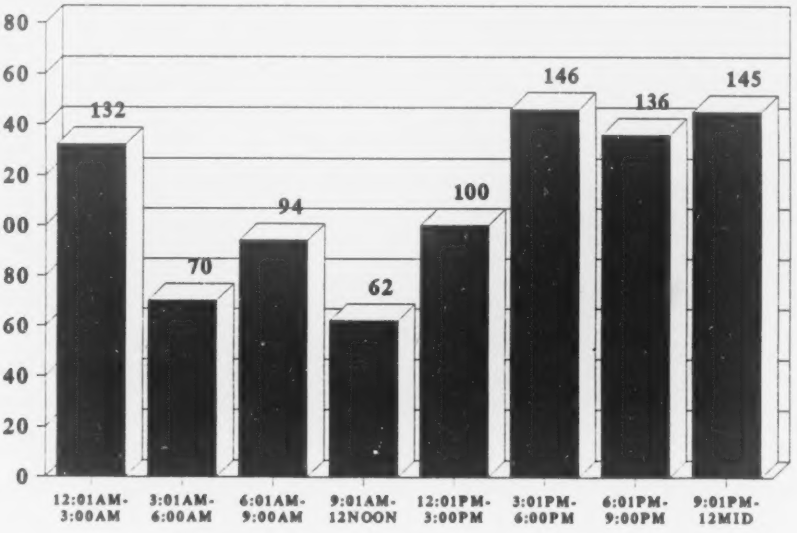
The frequency of traffic accidents is affected by the settings of the clock and calendar. The concentration of traffic, for example, is heavier at certain times of the day, days of the week and month. Travel is also affected by holidays and by special events such as football games. In addition to travel, driver attitudes, vision and behavior are influenced by these time factors. Also, the weather may be influenced by time of the year. On the following pages, statistics are presented which indicate observable differences in the occurrence of accidents with relation to various time variables. Some of the important observations in the 1990 data are as follows:

- Property damage only accidents are much more likely to occur during the daylight hours. More than 70% of accidents that have no injuries or fatalities occurred between 6:01am and 6:00pm.
- In contrast to the property damage only accidents, fatal accidents occurred more frequently in the nighttime hours between 6:01pm and 6:00am. More than 54 percent of all accidents involving fatalities occurred during this period.
- More traffic accidents were reported on Friday than on any other day of the week with of 19.7% of the total; the fewest traffic accidents were reported on Sundays with 9.7%.
- By far, the most fatal accidents were reported on Saturday, with 197 out of the 885 which occurred during the year. This represents more than 22% of all fatal accidents and is more than twice the number that occurred on Wednesday, the low day. Only 97 fatal accidents occurred on Wednesday, or 10.7% of the total.
- October was the leading month for all accidents in 1990. However, for the first time since 1984 fewer than 100 fatalities were reported for the month of October. More fatal accidents were reported in May than any other month in 1990 with 84, just ahead of the 83 reported in December.
- Traffic fatalities increased in 4 of the 6 holiday periods from 1989 to 1990 and decreased in the other two holiday periods. It should be noted that two of the holiday periods that increased (Christmas and New Years) were 24 hours longer in 1990 compared to 1989. Traffic fatalities decreased over the Thanksgiving holiday in 1990 to the lowest total in over a quarter of a century.

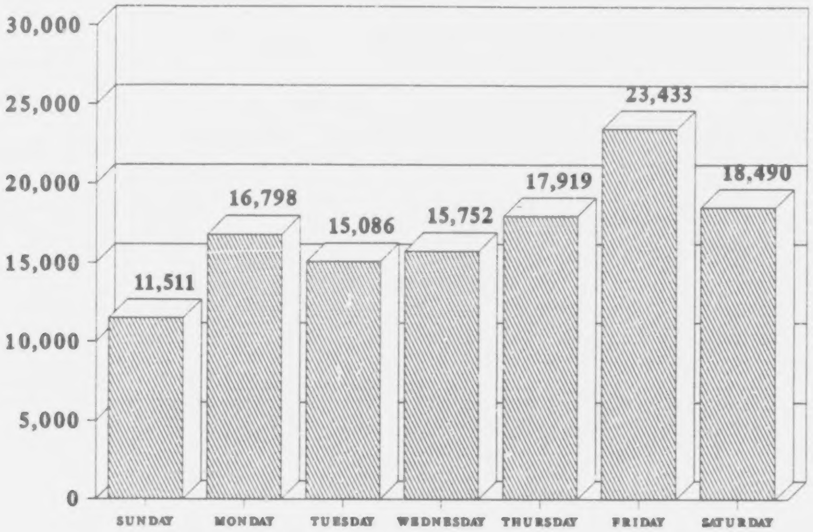
ALL ACCIDENTS BY TIME OF DAY
1990



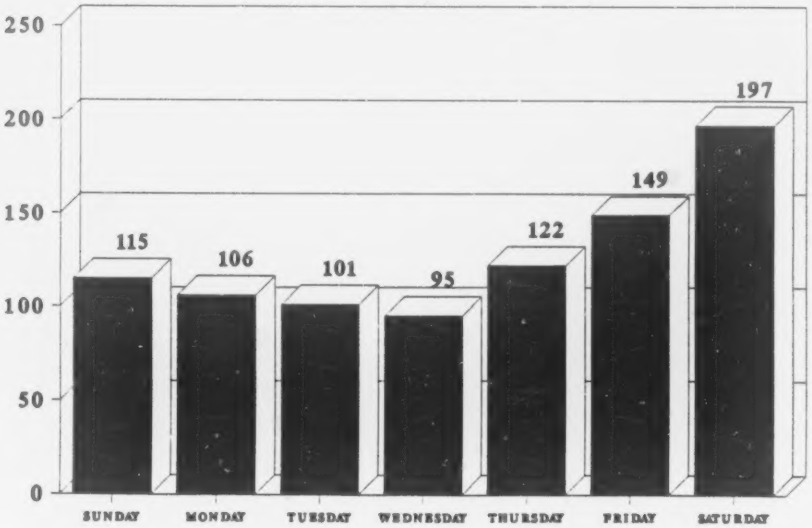
FATAL ACCIDENTS BY TIME OF DAY
1990



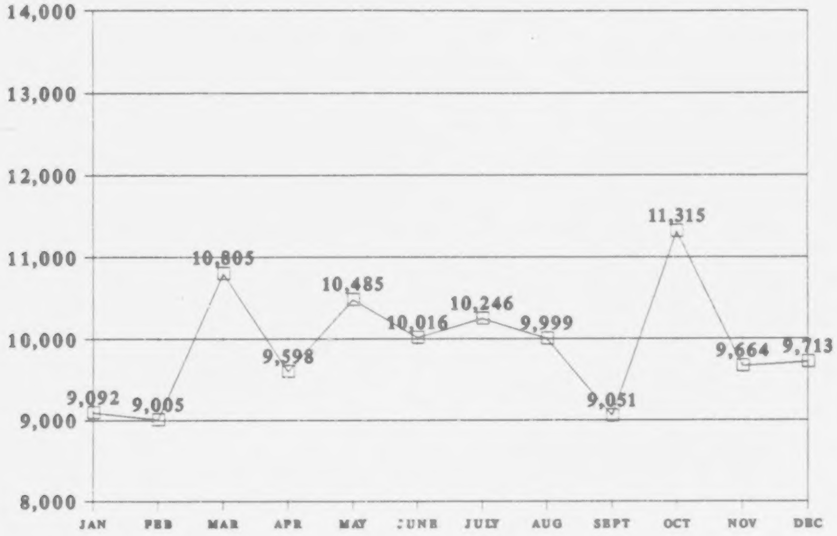
ALL ACCIDENTS BY DAY OF THE WEEK
1990



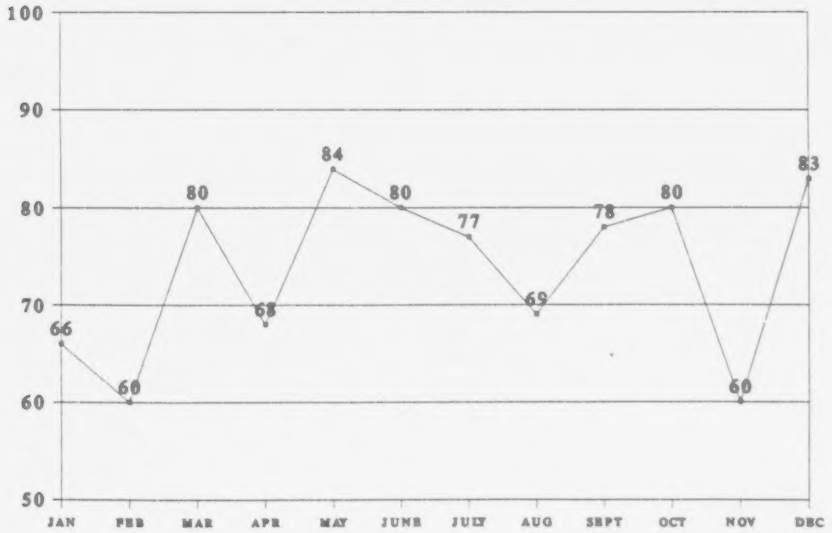
FATAL ACCIDENTS BY DAY OF THE WEEK
1990



ALL TRAFFIC ACCIDENTS BY MONTH
1990



FATAL TRAFFIC ACCIDENTS BY MONTH
1990



Traffic Accidents by Time of Day

The time of day had a substantial influence on the severity of traffic accidents which occurred during 1990. For all reported accidents, 68.4% occurred during the daylight hours, 6:01am to 6:00pm. However, only 45.4% of the fatal accidents occurred during this 12 hour period. The greatest number of accidents, both all and fatal, occurred during the afternoon rush hour, 3:01 to 6:00pm, but the percentages varied substantially. Exactly 26% of all accidents occurred during this three hour period. For fatal accidents the proportion was substantially smaller with only 16.5% occurring during this period.

The contrast between all and fatal accidents is even more apparent in the very early morning hours, between 12:01 and 6:00am. **More than twice** the percentage of fatal accidents (22.8%) occurred during these hours compared to all accidents (8.8%).

Traffic Accidents by Day of the Week

Differences in travel patterns and driver behavior between the seven days of the week are reflected in both the number and severity of traffic accidents which occurred in 1990. More accidents were reported on Friday than for any other day. Over 4,900 more accidents were reported on Friday than the second leading day, Saturday. A total of 20.5% of all accidents occurred on Friday. By contrast, the fewest accidents occurred on Sunday, with just 9.7% of the total.

The contrast between the days was even greater for fatal accidents. Far more fatal accidents were reported on Saturday than on any other day. The second leading day was Friday. The 197 reported fatal accidents on Saturday represented 22.3% of all fatal accidents; Friday's total of 149 represented 16.8%. Only 95 fatal accidents were reported on Wednesday, the day with the fewest fatal accidents. Less than half the number of fatal accidents were reported for Wednesday compared to Saturday.

Traffic Accidents by Month

The occurrence of traffic accidents differed substantially between the twelve months of 1990. The months of January, February and September each had more than 800 fewer accidents than the monthly average for the year (9,915). The peak month for all traffic accidents in 1990 was October with 11,315 reported accidents. In contrast to other years, there were no months with substantial icy weather conditions; as a result, all three winter months (January, February and December) had fewer accidents than the average month in 1990.

The month of May had the most fatal accidents of any month in 1990. The fewest fatal accidents were reported in February and November with 60 in each of those months. For the first time since 1984, fewer than 100 traffic fatalities were reported for the month of October. A total of 87 persons were killed in 80 fatal accidents during this month. An average month in 1990 had approximately 74 fatal accidents.

PERSONS KILLED AND FATAL ACCIDENTS FOR SELECTED HOLIDAY PERIODS IN SOUTH CAROLINA
1981 - 1990

Holiday & Years	Time Beginning	Days & Dates	Hours	Actual Holiday	Persons Killed	Fatal Accidents
Memorial Day						
1981	6 p.m.	05/22 - 05/25	78	Mon	12	11
1982	6 p.m.	05/28 - 05/31	78	Mon	5	5
1983	6 p.m.	05/27 - 05/30	78	Mon	7	6
1984	6 p.m.	05/25 - 05/28	78	Mon	5	5
1985	6 p.m.	05/24 - 05/27	78	Mon	12	10
1986	6 p.m.	05/23 - 05/26	78	Mon	17	14
1987	6 p.m.	05/22 - 05/25	78	Mon	10	8
1988	6 p.m.	05/27 - 05/30	78	Mon	10	8
1989	6 p.m.	05/26 - 05/29	78	Mon	13	9
1990	6 p.m.	05/25 - 05/28	78	Mon	12	10
Fourth of July						
1981	6 p.m.	07/02 - 07/05	78	Mon	13	12
1982	6 p.m.	07/02 - 07/05	78	Sun	8	7
1983	6 p.m.	07/01 - 07/04	78	Mon	17	13
1984	6 p.m.	07/03 - 07/04	30	Wed	3	2
1985	6 p.m.	07/03 - 07/07	102	Thru	20	18
1986	6 p.m.	07/03 - 07/05	78	Fri	17	17
1987	6 p.m.	07/02 - 07/05	78	Sat	13	13
1988	6 p.m.	07/01 - 07/04	78	Mon	16	15
1989	6 p.m.	06/30 - 07/04	102	Tue	16	14
1990	6 p.m.	07/03 - 07/04	30	Wed	9	9
Labor Day						
1981	6 p.m.	09/04 - 09/07	78	Mon	8	8
1982	6 p.m.	09/03 - 09/06	78	Mon	10	9
1983	6 p.m.	09/02 - 09/05	78	Mon	11	11
1984	6 p.m.	08/31 - 09/03	78	Mon	12	10
1985	6 p.m.	08/30 - 09/02	78	Mon	11	11
1986	6 p.m.	08/29 - 09/01	78	Mon	14	7
1987	6 p.m.	09/04 - 09/07	78	Mon	25	14
1988	6 p.m.	09/02 - 09/05	78	Mon	15	14
1989	6 p.m.	09/01 - 09/04	78	Mon	5	5
1990	6 p.m.	08/31 - 09/03	78	Mon	17	16

PERSONS KILLED AND FATAL ACCIDENTS FOR SELECTED HOLIDAY PERIODS IN SOUTH CAROLINA
1981 - 1990

Holiday & Years	Time Beginning	Days & Dates	Hours	Actual Holiday	Persons Killed	Fatal Accidents
Thanksgiving						
1981	6 p.m.	11/25 - 11/29	102	Thru	7	7
1982	6 p.m.	11/24 - 11/28	102	Thru	6	5
1983	6 p.m.	11/23 - 11/27	102	Thru	13	11
1984	6 p.m.	11/21 - 11/25	102	Thru	13	13
1985	6 p.m.	11/27 - 12/01	102	Thru	13	12
1986	6 p.m.	11/26 - 11/30	102	Thru	11	12
1987	6 p.m.	11/25 - 11/29	102	Thru	19	15
1988	6 p.m.	11/23 - 11/27	102	Thru	20	13
1989	6 p.m.	11/22 - 11/26	102	Thru	15	14
1990	6 p.m.	11/22 - 11/26	102	Thru	6	6
Christmas						
1981	6 p.m.	12/24 - 12/27	78	Fri	13	10
1982	6 p.m.	12/23 - 12/26	78	Sat	8	8
1983	6 p.m.	12/23 - 12/26	78	Sun	10	9
1984	6 p.m.	12/21 - 12/25	102	Tue	20	19
1985	6 p.m.	12/24 - 12/25	30	Wed	6	4
1986	6 p.m.	12/24 - 12/28	102	Thru	16	15
1987	6 p.m.	12/24 - 12/27	78	Fri	10	10
1988	6 p.m.	12/23 - 12/26	78	Sun	4	4
1989	6 p.m.	12/22 - 12/25	78	Mon	10	10
1990	6 p.m.	12/21 - 12/25	102	Tue	23	19
New Years						
1981	6 p.m.	12/31/81 - 01/03/82	78	Fri	8	8
1982	6 p.m.	12/30/82 - 01/02/83	78	Sat	8	8
1983	6 p.m.	12/30/83 - 01/02/84	78	Sun	8	8
1984	6 p.m.	12/28/84 - 01/01/85	102	Tue	12	10
1985	6 p.m.	12/31/85 - 01/01/86	30	Wed	4	4
1986	6 p.m.	12/31/86 - 01/04/87	102	Thru	27	20
1987	6 p.m.	12/31/87 - 01/03/88	78	Fri	6	6
1988	6 p.m.	12/30/88 - 01/02/89	78	Sun	14	12
1989	6 p.m.	12/29/89 - 01/01/90	78	Mon	10	10
1990	6 p.m.	12/28/90 - 01/01/91	102	Tue	14	13

SOUTH CAROLINA
MOTOR VEHICLE TRAFFIC DEATH CALENDAR
1990

JANUARY

	SUN	MON	TUE	WED	THUR	FRI	SAT
		1 2	2 1	3 0	4 2	5 1	6 3
	7 5	8 0	9 2	10 0	11 3	12 3	13 1
	14 3	15 2	16 3	17 2	18 1	19 2	20 2
	21 1	22 2	23 0	24 3	25 8	26 2	27 3
	28 5	29 3	30 1	31 6			
Total	14	9	7	11	14	8	9

Monthly Total 72

FEBRUARY

	SUN	MON	TUE	WED	THUR	FRI	SAT
					1 1	2 3	3 3
	4 2	5 0	6 0	7 2	8 1	9 3	10 8
	11 2	12 2	13 2	14 0	15 1	16 4	17 6
	18 3	19 2	20 2	21 0	22 3	23 4	24 2
	25 0	26 3	27 2	28 2			
Total	7	7	6	4	6	14	19

Monthly Total 63

MARCH

	SUN	MON	TUE	WED	THUR	FRI	SAT
					1 0	2 2	3 10
	4 2	5 3	6 1	7 3	8 1	9 3	10 4
	11 1	12 1	13 0	14 6	15 3	16 5	17 5
	18 4	19 3	20 4	21 0	22 4	23 6	24 5
	25 3	26 1	27 1	28 1	29 6	30 5	31 3
Total	10	8	6	10	14	21	27

Monthly Total 96

APRIL

	SUN	MON	TUE	WED	THUR	FRI	SAT
	1 1	2 0	3 2	4 4	5 2	6 4	7 5
	8 0	9 4	10 1	11 2	12 3	13 4	14 2
	15 0	16 2	17 4	18 1	19 1	20 4	21 3
	22 4	23 2	24 2	25 2	26 2	27 7	28 8
	29 1	30 0					
Total	6	8	9	9	8	19	18

Monthly Total 77

MAY

	SUN	MON	TUE	WED	THUR	FRI	SAT
			1 1	2 1	3 3	4 3	5 5
	6 2	7 2	8 2	9 3	10 4	11 3	12 3
	13 5	14 2	15 2	16 1	17 3	18 1	19 7
	20 9	21 4	22 5	23 0	24 3	25 5	26 6
	27 1	28 1	29 2	30 0	31 5		
Total	17	9	12	5	18	12	21

Monthly Total 94

JUNE

	SUN	MON	TUE	WED	THUR	FRI	SAT
						1 5	2 4
	3 2	4 6	5 3	6 3	7 4	8 5	9 11
	10 4	11 1	12 4	13 1	14 1	15 1	16 1
	17 1	18 3	19 1	20 1	21 2	22 3	23 5
	24 1	25 4	26 1	27 3	28 2	29 2	30 3
Total	8	14	9	8	9	16	24

Monthly Total 88

SOUTH CAROLINA
MOTOR VEHICLE TRAFFIC DEATH CALENDAR
1990

JULY

	SUN	MON	TUE	WED	THUR	FRI	SAT
	1 4	2 0	3 4	4 7	5 1	6 0	7 4
	8 1	9 3	10 3	11 4	12 2	13 3	14 3
	15 3	16 2	17 1	18 2	19 3	20 2	21 8
	22 5	23 3	24 1	25 0	26 0	27 2	28 5
	29 3	30 2	31 2				
Total	16	10	11	13	6	7	20

Monthly Total 83

AUGUST

	SUN	MON	TUE	WED	THUR	FRI	SAT
				1 4	2 0	3 0	4 3
	5 2	6 3	7 0	8 3	9 1	10 0	11 3
	12 5	13 2	14 3	15 2	16 5	17 5	18 3
	19 1	20 5	21 4	22 2	23 1	24 3	25 4
	26 3	27 3	28 1	29 1	30 2	31 5	
Total	11	13	8	12	9	13	13

Monthly Total 79

SEPTEMBER

	SUN	MON	TUE	WED	THUR	FRI	SAT
							1 7
	2 3	3 5	4 2	5 1	6 2	7 4	8 7
	9 2	10 2	11 4	12 3	13 4	14 10	15 5
	16 3	17 0	18 6	19 0	20 1	21 1	22 5
	23 1	24 0	25 2	26 2	27 3	28 0	29 2
	30 3						
Total	12	7	14	6	10	15	26

Monthly Total 90

OCTOBER

	SUN	MON	TUE	WED	THUR	FRI	SAT
		1 5	2 2	3 5	4 4	5 4	6 3
	7 1	8 2	9 0	10 5	11 4	12 1	13 6
	14 3	15 0	16 4	17 3	18 4	19 3	20 2
	21 3	22 0	23 2	24 1	25 4	26 6	27 3
	28 2	29 2	30 1	31 2			
Total	9	9	9	16	16	14	14

Monthly Total 87

NOVEMBER

	SUN	MON	TUE	WED	THUR	FRI	SAT
					1 2	2 3	3 3
	4 0	5 3	6 7	7 1	8 0	9 2	10 2
	11 3	12 4	13 1	14 0	15 3	16 7	17 3
	18 3	19 3	20 2	21 1	22 1	23 2	24 2
	25 0	26 2	27 1	28 1	29 2	30 1	
Total	6	12	11	3	8	15	10

Monthly Total 65

DECEMBER

	SUN	MON	TUE	WED	THUR	FRI	SAT
							1 2
	2 0	3 2	4 0	5 3	6 5	7 1	8 3
	9 2	10 1	11 3	12 5	13 6	14 3	15 6
	16 2	17 1	18 2	19 1	20 2	21 7	22 5
	23 5	24 5	25 4	26 0	27 1	28 1	29 3
	30 7	31 1					
Total	16	10	9	9	14	12	19

Monthly Total 89

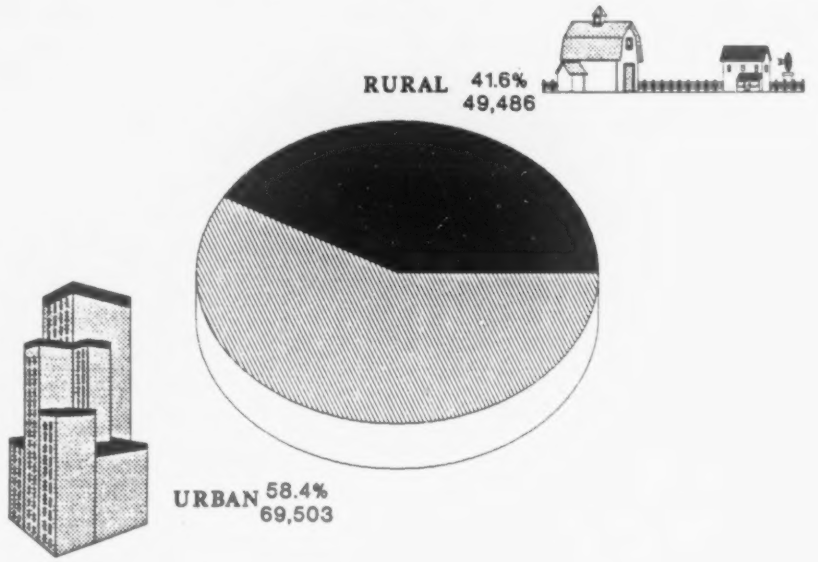
C. Location

No area of South Carolina was immune from traffic accidents in 1990. Every county experienced the tragedy of at least three fatal traffic accidents during the year. Eight of the state's 46 counties had at least 40 traffic fatalities during the year. A variety of factors influence where traffic accidents, injuries and fatalities occur including the volume of traffic on a particular highway, weather variations, travel patterns and many other factors. On the following pages, statistics are presented which indicate observable differences in the occurrence of traffic accidents with relation to various location categories. Some of the important observations in the data are as follows:

- In 1990, the most traffic accidents occurred in Charleston County with 14,019. The most fatal accidents were in Greenville Count with 75.
- A total of 63,685 accidents were investigated by the South Carolina Highway Patrol. This represents 53.5% of the total.
- More accidents occured on US Primary routes than on any other route category. These routes accounted for 32.6% of all reported accidents.
- The secondary routes accounted for the largest percentage of fatal accidents with 34.4% of the total. The 304 fatal accidents which occurred on the secondary routes were nearly 5 times the 63 fatal accidents reported on the Interstates.
- A total of 6,472 accidents occurred on the Interstates. This was approximately 1/6 of the total reported for US Primary routes.
- A total of 45.9% of all reported traffic accidents in 1990 occurred at a "nonjunction" location. The 438 fatal accidents at a "nonjunction" location represent slightly less than half of all fatal traffic accidents for the year. (See definitions page for a definition of "nonjunction".)

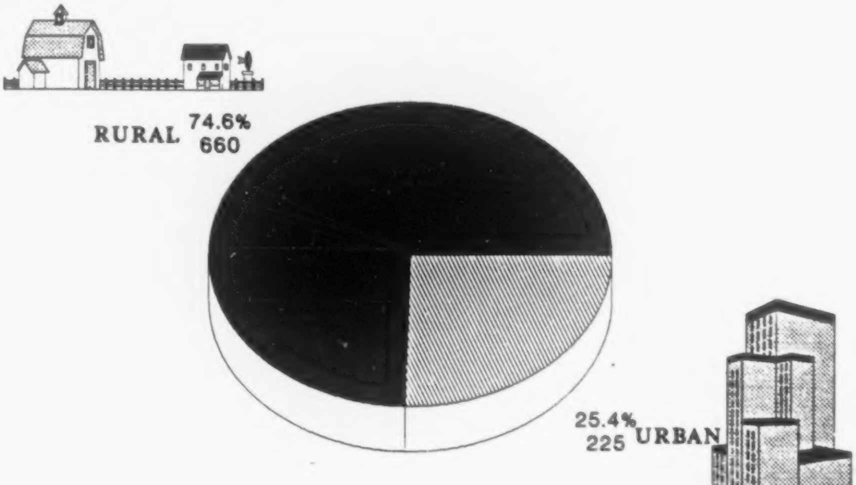
ALL TRAFFIC ACCIDENTS: RURAL/URBAN*

1990



FATAL TRAFFIC ACCIDENTS: RURAL/URBAN*

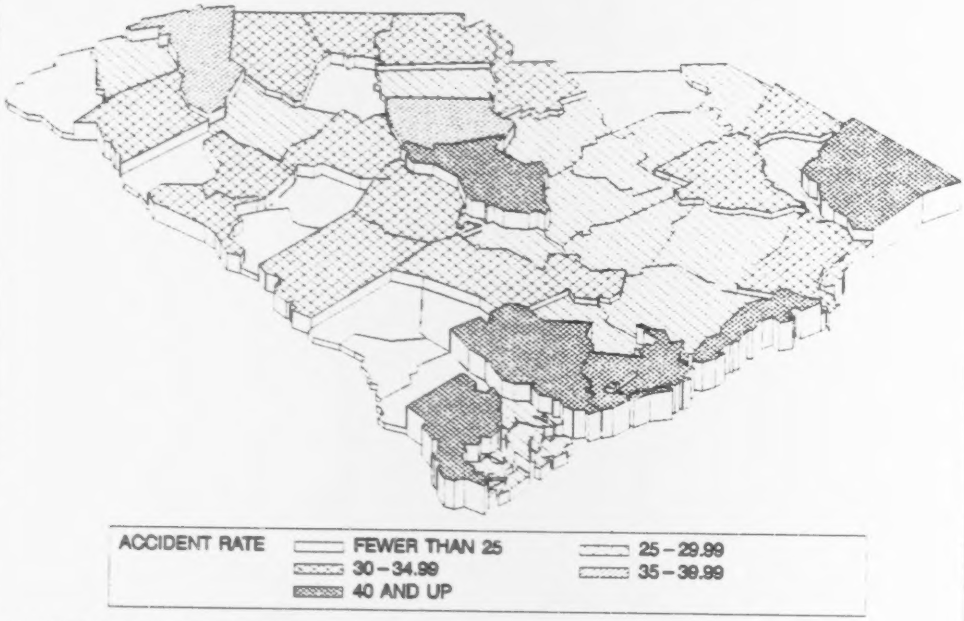
1990



* See page 86 for definitions of urban and rural areas.

TRAFFIC ACCIDENTS PER 1000 POPULATION*

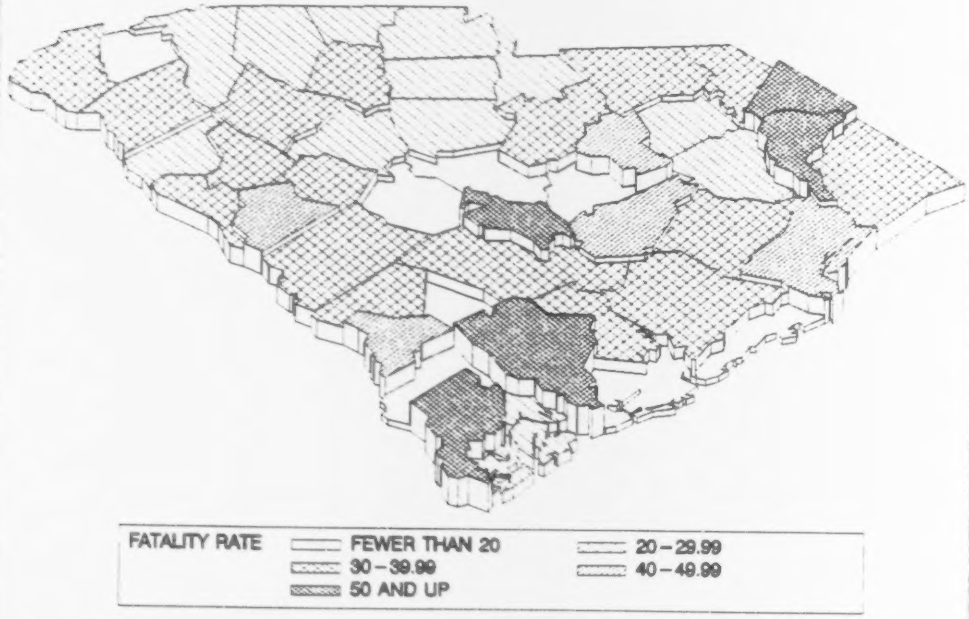
1990



* BASED ON 1990 CENSUS DATA

TRAFFIC FATALITIES PER 100,000 POPULATION*

1990



*BASED ON 1990 CENSUS DATA

SOUTH CAROLINA TRAFFIC ACCIDENT DEATHS
BY HIGHWAY DISTRICT
1989 vs. 1990

DISTRICT #1

	DEATHS	
COUNTY	1989	1990
Aiken	37	47
Kershaw	14	15
Lee	9	8
Lexington	36	28
Richland	45	49
Sumter	29	19
Total	170	166

DISTRICT #2

	DEATHS	
COUNTY	1989	1990
Abbeville	7	5
Edgefield	6	8
Greenwood	13	19
Laurens	11	19
McCormick	1	3
Newberry	4	7
Saluda	6	6
Total	48	67

DISTRICT #3

	DEATHS	
COUNTY	1989	1990
Anderson	40	47
Greenville	80	78
Oconee	22	20
Pickens	21	18
Spartanburg	62	54
Total	225	217

DISTRICT #4

	DEATHS	
COUNTY	1989	1990
Cherokee	20	12
Chester	15	9
Chesterfield	18	12
Fairfield	7	6
Lancaster	23	14
Union	6	10
York	30	34
Total	119	97

DISTRICT #5

	DEATHS	
COUNTY	1989	1990
Darlington	42	18
Dillon	25	16
Florence	27	25
Georgetown	15	20
Horry	40	49
Marion	11	17
Marlboro	14	11
Williamsburg	26	14
Total	200	170

DISTRICT #6

	DEATHS	
COUNTY	1989	1990
Beaufort	17	21
Berkeley	27	41
Charleston	45	51
Colleton	10	36
Dorchester	23	27
Jasper	14	18
Total	136	194

DISTRICT #7

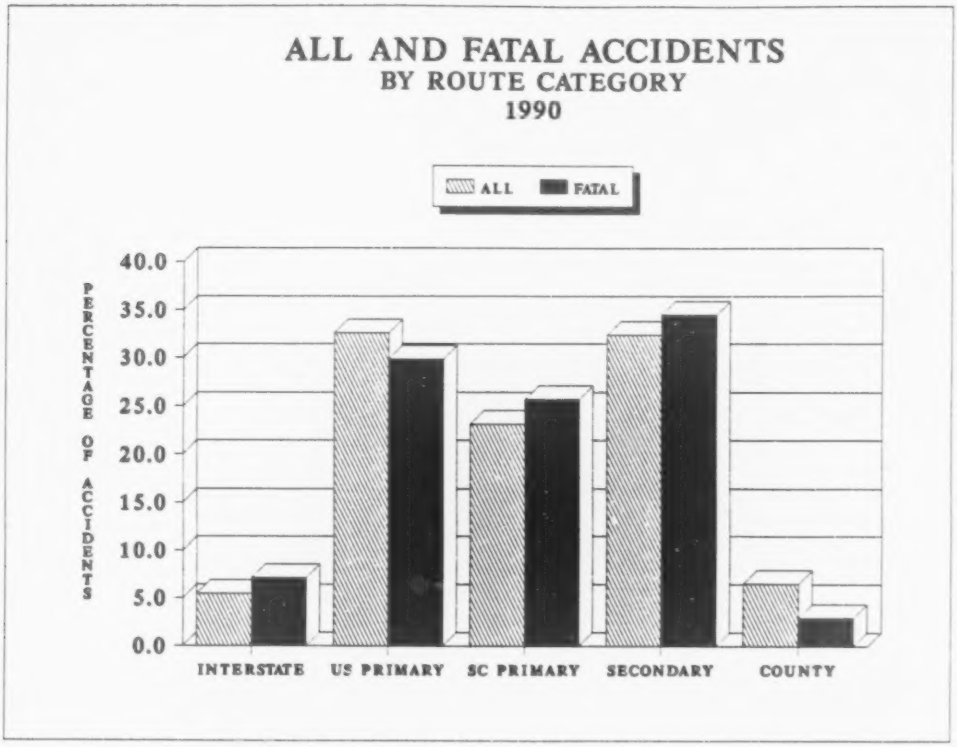
	DEATHS	
COUNTY	1989	1990
Allendale	4	5
Bamberg	17	3
Barnwell	3	7
Calhoun	4	15
Clarendon	20	13
Hampton	10	3
Orangeburg	40	26
Total	98	72

STATE TOTALS

	YEAR	
DISTRICT	1989	1990
District #1	170	166
District #2	48	67
District #3	225	217
District #4	119	97
District #5	200	170
District #6	136	194
District #7	98	72
TOTAL	996	983

SOUTH CAROLINA
MOTOR VEHICLE TRAFFIC ACCIDENTS BY COUNTY - 1990

COUNTY	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
Abbeville	5	127	348	480	5	211
Aiken	44	972	2,902	3,918	47	1,600
Allendale	5	82	142	229	5	163
Anderson	41	1,193	3,320	4,554	47	1,904
Bamberg	3	103	250	356	3	169
Barnwell	4	118	291	413	7	181
Beaufort	19	473	1,844	2,336	21	735
Berkeley	37	767	2,788	3,592	41	1,187
Calhoun	12	84	256	352	15	144
Charleston	47	3,384	10,588	14,019	51	5,184
Cherokee	12	423	1,007	1,442	12	721
Chester	9	304	632	945	9	517
Chesterfield	12	283	584	879	12	486
Clarendon	10	215	524	749	13	356
Colleton	30	316	1,135	1,481	36	561
Darlington	17	605	1,032	1,654	18	1,058
Dillon	15	309	689	1,013	16	641
Dorchester	24	525	1,791	2,340	27	833
Edgefield	8	134	240	382	8	210
Fairfield	6	201	591	798	6	346
Florence	22	1,148	2,772	3,942	25	1,931
Georgetown	17	402	987	1,406	20	711
Greenville	75	2,800	9,728	12,603	78	4,339
Greenwood	17	544	1,497	2,058	19	865
Hampton	3	57	333	393	3	84
Horry	43	1,731	4,896	6,670	49	3,048
Jasper	18	138	533	689	18	219
Kershaw	13	292	919	1,224	15	465
Lancaster	11	518	1,171	1,700	14	832
Laurens	16	473	1,158	1,647	19	780
Lee	5	172	287	464	8	280
Lexington	24	1,321	4,364	5,709	28	2,159
McCormick	3	56	215	274	3	86
Marion	13	298	616	927	17	516
Marlboro	10	262	474	746	11	476
Newberry	7	216	808	1,031	7	358
Oconee	18	363	1,034	1,415	20	583
Orangeburg	25	636	2,050	2,711	26	1,026
Pickens	16	639	1,698	2,353	18	944
Richland	46	2,485	9,620	12,151	49	3,830
Saluda	4	121	269	394	6	198
Spartanburg	52	2,137	5,687	7,876	54	3,523
Sumter	18	595	2,094	2,707	19	1,005
Union	7	230	510	747	10	369
Williamsburg	13	290	618	921	14	549
York	29	1,234	3,036	4,299	34	1,954
Total	**885**	**29,776**	**88,328**	**118,989**	**983**	**48,337**



A total of 38,754 traffic accidents were reported on US Primary routes during 1990. This was the most for any of the five route category classifications, and accounted for 32.6% of all reported accidents. The South Carolina secondary routes were a close second, accounting for 38,482 (32.3%) of the reported accident total. The fewest reported accidents were on the Interstate highways. A total of 6,472 accidents were reported for these routes. This was just slightly more than 1/6 of the total reported for US Primary routes.

The proportion of fatal accidents occurring on the Secondary routes is even higher than for all accidents. The 304 fatal accidents which occurred on these routes accounted for 34.4% of the 885 fatal accidents reported in 1990. On the US and SC Primary routes, 264 and 227 fatal accidents respectively were reported during the year. The fewest fatal accidents occurred on the County routes with 26 (2.9%). A total of 63 (7.1%) fatal accidents were reported for the Interstates. This was just over 1/5 the total reported for the Secondary routes and is slightly less than the 65 fatal Interstate accidents reported in 1989.

TRAFFIC ACCIDENTS INVESTIGATED BY JURISDICTION
1990

	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
JURISDICTION	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
S.C. HWY PATROL DIST. 1	135	3,164	11,419	14,718	150	5,065
S.C. HWY PATROL DIST. 2	53	1,025	2,887	3,965	60	1,617
S.C. HWY PATROL DIST. 3	175	4,074	12,740	16,989	188	6,424
S.C. HWY PATROL DIST. 4	74	1,882	4,510	6,466	84	3,070
S.C. HWY PATROL DIST. 5	123	2,803	6,718	9,644	138	4,906
S.C. HWY PATROL DIST. 6	122	1,583	6,877	8,582	136	2,475
S.C. HWY PATROL DIST. 7	55	748	2,524	3,327	65	1,171
ABBEVILLE POLICE DEPT.	0	38	108	146	0	71
AIKEN COUNTY SHERIFF	1	26	80	107	1	37
AIKEN POLICE DEPT.	2	240	746	988	2	396
ALLENDALE COUNTY SHERIFF	0	1	0	1	0	5
ALLENDALE POLICE DEPT.	1	38	45	84	1	88
ANDERSON COUNTY SHERIFF	0	2	1	3	0	2
ANDERSON POLICE DEPT.	5	281	781	1,067	5	468
ANDREWS POLICE DEPT.	1	25	61	87	2	37
ATLANTIC BEACH POLICE DEPT.	1	14	42	57	1	39
AYNOR POLICE DEPT.	1	4	31	36	2	8
BAMBERG COUNTY SHERIFF	0	0	1	1	0	0
BAMBERG POLICE DEPT.	0	34	37	71	0	57
BARNWELL POLICE DEPT.	0	54	91	145	0	88
BATESBURG POLICE DEPT.	0	43	72	115	0	77
BEAUFORT COUNTY SHERIFF	0	94	354	448	0	143
BEAUFORT POLICE DEPT.	0	120	362	482	0	158
BELTON POLICE DEPT.	0	39	63	102	0	53
BENNETTSVILLE POLICE DEPT.	0	56	116	172	0	110
BERKELEY COUNTY SHERIFF	0	3	0	3	0	3
BETHUNE POLICE DEPT.	0	2	4	6	0	2
BISHOPVILLE POLICE DEPT.	0	35	33	68	0	68
BLACKSBURG POLICE DEPT.	0	10	30	40	0	18
BLACKVILLE POLICE DEPT.	1	20	26	47	1	30
BLUFFTON POLICE DEPT.	0	2	3	5	0	2
BONNEAU POLICE DEPT.	0	8	1	9	0	19
BOWMAN POLICE DEPT.	0	0	2	2	0	0
BRANCHVILLE POLICE DEPT.	0	1	15	16	0	1
BRUNSON POLICE DEPT.	0	1	4	5	0	1
CALHOUN FALLS POLICE DEPT.	0	4	13	17	0	8
CAMDEN POLICE DEPT.	0	69	181	250	0	125
CAMERON POLICE DEPT.	0	1	0	1	0	1
CAMPOBELLO POLICE DEPT.	0	0	2	2	0	0
CAYCE POLICE DEPT.	1	123	324	448	1	206
PAGE TOTAL	751	16,667	51,304	68,722	837	27,049

TRAFFIC ACCIDENTS INVESTIGATED BY JURISDICTION
1990 (cont.)

JURISDICTION	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
CENTRAL POLICE DEPT.	0	7	28	35	0	11
CHAPIN POLICE DEPT.	0	2	14	16	0	5
CHARLESTON AVIATION AUTH.	0	3	4	7	0	5
CHARLESTON COUNTY SHERIFF	0	3	5	8	0	3
CHARLESTON COUNTY POLICE	26	1,064	2,235	3,325	30	1,719
CHARLESTON POLICE DEPT.	5	866	3,216	4,087	5	1,315
CHERAW POLICE DEPT	0	64	121	185	0	114
CHESNEE POLICE DEPT.	0	19	44	63	0	27
CHESTER COUNTY SHERIFF	0	0	1	1	0	0
CHESTER POLICE DEPT.	0	47	121	168	0	82
CHESTERFIELD POLICE DEPT.	0	12	24	36	0	23
CITY VIEW POLICE DEPT.	0	3	6	9	0	3
CLARENDON COUNTY SHERIFF	1	0	10	11	1	0
CLEMSON POLICE DEPT.	1	79	262	342	1	119
CLEMSON UNIVERSITY POLICE	0	31	99	130	0	42
CLINTON POLICE DEPT.	0	74	154	228	0	135
CLOVER POLICE DEPT.	0	25	70	95	0	37
COLLETON COUNTY SHERIFF	0	2	2	4	0	6
COLUMBIA METRO. AIRPORT PD.	0	3	6	9	0	5
COLUMBIA POLICE DEPT.	4	1,214	4,577	5,795	5	1,832
CONWAY POLICE DEPT.	2	132	403	537	2	232
COTTAGEVILLE POLICE DEPT.	0	0	3	3	0	0
COWARD POLICE DEPT.	0	0	1	1	0	0
COWPENS POLICE DEPT.	0	11	22	33	0	22
CROSS HILL POLICE DEPT.	0	2	2	4	0	3
DARLINGTON POLICE DEPT.	2	65	164	231	2	113
DENMARK POLICE DEPT.	1	21	35	57	1	38
DILLON POLICE DEPT.	2	93	234	329	2	174
DORCHESTER COUNTY SHERIFF	0	2	15	17	0	2
DUE WEST POLICE DEPT.	0	1	5	6	0	2
DUNCAN POLICE DEPT.	0	15	36	51	0	15
EASLEY POLICE DEPT.	1	151	466	618	1	223
EASTOVER POLICE DEPT.	0	2	8	10	0	3
EDGEFIELD COUNTY SHERIFF	0	5	2	7	0	8
EDGEFIELD POLICE DEPT.	0	20	37	57	0	28
EDISTO BEACH POLICE DEPT.	0	1	5	6	0	1
ELGIN POLICE DEPT.	0	2	7	9	0	2
ELLOREE POLICE DEPT.	0	3	19	22	0	5
ENOREE POLICE DEPT.	0	0	1	1	0	0
ESTILL POLICE DEPT.	0	7	21	28	0	13
PAGE TOTAL	45	4,051	12,485	16,581	50	6,367

TRAFFIC ACCIDENTS INVESTIGATED BY JURISDICTION
1990 (cont.)

JURISDICTION	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
EUTAWVILLE POLICE DEPT.	1	0	8	9	1	0
FAIRFAX POLICE DEPT.	0	6	17	23	0	13
FAIRFIELD COUNTY SHERIFF	0	0	2	2	0	0
FLORENCE COUNTY SHERIFF	0	1	1	2	0	1
FLORENCE POLICE DEPT.	4	515	1,114	1,633	4	860
FOLLY BEACH POLICE DEPT.	0	8	43	51	0	11
FOREST ACRES POLICE DEPT.	0	66	228	294	0	100
FORT LAWN POLICE DEPT.	0	0	1	1	0	0
FORT MILL POLICE DEPT.	0	30	70	100	0	43
FOUNTAIN INN POLICE DEPT.	0	31	78	109	0	53
GAFFNEY POLICE DEPT.	3	168	344	515	3	279
GASTON POLICE DEPT.	0	0	1	1	0	0
GEORGETOWN COUNTY SHERIFF	0	28	40	68	0	49
GEORGETOWN POLICE DEPT.	1	148	313	462	1	282
GIFFORD POLICE DEPT.	0	0	1	1	0	0
GOOSE CREEK POLICE DEPT.	1	132	446	579	1	194
GRAY COURT POLICE DEPT.	1	4	8	13	1	5
GREAT FALLS POLICE DEPT.	0	27	39	66	0	44
GREENVILLE COUNTY SHERIFF	0	10	19	29	0	16
GREENVILLE POLICE DEPT.	10	921	3,343	4,274	11	1,398
GRNVILLE/SPRTBRG AIRPORT PD.	0	0	1	1	0	0
GREENWOOD COUNTY SHERIFF	0	0	1	1	0	0
GREENWOOD POLICE DEPT.	2	219	622	843	2	347
GREER POLICE DEPT.	1	161	327	489	1	252
HAMPTON COUNTY SHERIFF	0	2	3	5	0	4
HAMPTON POLICE DEPT.	0	18	72	90	0	25
HANAHAN POLICE DEPT.	2	59	123	184	3	84
HARDEVILLE POLICE DEPT.	2	10	33	45	2	15
HARLEYVILLE POLICE DEPT.	0	0	5	5	0	0
HARTSVILLE POLICE DEPT.	1	94	237	332	1	156
HEATH SPRINGS POLICE DEPT.	0	0	5	5	0	0
HEMINGWAY POLICE DEPT.	0	11	32	43	0	19
HOLLY HILL POLICE DEPT.	0	19	43	62	0	33
HONEA PATH POLICE DEPT.	0	21	70	91	0	27
HORRY COUNTY SHERIFF	0	2	0	2	0	12
INMAN POLICE DEPT.	0	14	38	52	0	21
IRMO POLICE DEPT.	0	42	155	197	0	63
ISLE OF PALMS POLICE DEPT.	0	6	40	46	0	8
IVA POLICE DEPT.	0	4	14	18	0	4
JACKSON POLICE DEPT.	0	14	24	38	0	38
PAGE TOTAL	29	2,791	7,961	10,781	31	4,456

TRAFFIC ACCIDENTS INVESTIGATED BY JURISDICTION
1990 (cont.)

JURISDICTION	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
JAMESTOWN POLICE DEPT.	0	1	2	3	0	12
JEFFERSON POLICE DEPT.	0	1	0	1	0	1
JOHNSONVILLE POLICE DEPT.	0	6	23	29	0	9
JOHNSTON POLICE DEPT.	2	12	27	41	2	22
JONESVILLE POLICE DEPT.	1	1	22	24	1	1
KERSHAW COUNTY SHERIFF	0	2	1	3	0	2
KERSHAW POLICE DEPT.	0	16	32	48	0	26
KINGSTREE POLICE DEPT.	1	48	126	175	1	101
LAKE CITY POLICE DEPT.	0	77	153	230	0	126
LAKEVIEW POLICE DEPT.	0	4	18	22	0	14
LAMAR POLICE DEPT.	0	5	15	20	0	13
LANCASTER COUNTY SHERIFF	0	0	3	3	0	0
LANCASTER POLICE DEPT.	0	134	296	430	0	225
LANDRUM POLICE DEPT.	0	16	33	49	0	33
LATTA POLICE DEPT.	0	23	33	56	0	59
LAURENS COUNTY SHERIFF	0	1	0	1	0	1
LAURENS POLICE DEPT.	1	112	263	376	1	182
LEESVILLE POLICE DEPT.	0	5	18	23	0	10
LEXINGTON COUNTY SHERIFF	0	24	64	88	0	33
LEXINGTON POLICE DEPT.	0	64	225	289	0	106
LIBERTY POLICE DEPT.	0	30	68	98	0	46
LINCOLNVILLE POLICE DEPT.	0	2	3	5	0	4
LORIS POLICE DEPT.	0	23	61	84	0	66
LYMAN POLICE DEPT.	0	23	37	60	0	35
LYNCHBURG POLICE DEPT.	0	5	3	8	0	5
MANNING POLICE DEPT.	0	50	94	144	0	91
MARION COUNTY SHERIFF	0	2	0	2	0	6
MARION POLICE DEPT.	0	62	101	163	0	98
MAULDIN POLICE DEPT.	2	102	251	355	2	164
MAYESVILLE POLICE DEPT.	0	1	1	2	0	4
MCBEE POLICE DEPT.	1	4	8	13	1	8
MCCOLL POLICE DEPT.	0	8	17	25	0	10
MCCORMICK POLICE DEPT.	0	18	56	74	0	28
MONCKS CORNER POLICE DEPT.	0	88	184	272	0	160
MT. PLEASANT POLICE DEPT.	2	269	934	1,205	2	411
MULLINS POLICE DEPT.	2	41	111	154	4	71
MYRTLE BEACH POLICE DEPT.	7	475	1,208	1,690	8	842
NEW ELLENTON POLICE DEPT.	0	10	15	25	0	17
NEWBERRY POLICE DEPT.	1	69	210	280	1	145
NICHOLS POLICE DEPT.	0	4	6	10	0	5
PAGE TOTAL	20	1,838	4,722	6,580	23	3,192

TRAFFIC ACCIDENTS INVESTIGATED BY JURISDICTION
1990 (cont.)

JURISDICTION	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
NINETY SIX POLICE DEPT.	0	8	14	22	0	12
NORTH POLICE DEPT.	0	0	5	5	0	0
NORTH AUGUSTA POLICE DEPT.	2	158	474	634	2	254
NORTH CHARLESTON PD.	9	902	2,823	3,734	9	1,339
NORTH MYRTLE BEACH PD.	2	208	497	707	2	397
NORWAY POLICE DEPT.	0	0	1	1	0	0
OLANTA POLICE DEPT.	0	1	1	2	0	1
OLAR POLICE DEPT.	0	0	3	3	0	0
ORANGEBURG COUNTY SHERIFF	0	0	2	2	0	0
ORANGEBURG POLICE DEPT.	1	213	620	834	1	364
PACOLET POLICE DEPT.	0	15	20	35	0	22
PACOLET MILLS POLICE DEPT.	0	0	1	1	0	0
PAGELAND POLICE DEPT.	0	27	63	90	0	40
PELION POLICE DEPT.	0	1	2	3	0	2
PELZER POLICE DEPT.	0	0	2	2	0	0
PENDELETON POLICE DEPT.	0	19	50	69	0	31
PICKENS COUNTY SHERIFF	0	1	1	2	0	1
PICKENS POLICE DEPT.	0	28	109	137	0	40
PINE RIDGE POLICE DEPT.	0	5	5	10	0	9
PINEWOOD POLICE DEPT.	0	0	5	5	0	0
PORT ROYAL POLICE DEPT.	0	29	55	84	0	50
PROSPERITY POLICE DEPT.	0	8	15	23	0	10
QUINBY POLICE DEPT.	0	3	7	10	0	6
RICHLAND COUNTY SHERIFF	0	3	17	20	0	4
RIDGE SPRING POLICE DEPT.	0	4	4	8	0	6
RIDGELAND POLICE DEPT.	0	18	24	42	0	25
RIDGEVILLE POLICE DEPT.	0	0	2	2	0	0
RIDGEWAY POLICE DEPT.	0	3	8	11	0	8
ROCK HILL POLICE DEPT.	6	545	1,298	1,849	6	880
S.C. PORTS AUTHORITY	0	0	1	1	0	0
SALLEY POLICE DEPT.	0	2	4	6	0	2
SALUDA COUNTY SHERIFF	0	0	1	1	0	0
SALUDA POLICE DEPT.	0	16	54	70	0	26
SANTEE POLICE DEPT.	0	7	14	21	0	9
SELLERS POLICE DEPT.	0	0	1	1	0	0
SENECA POLICE DEPT.	1	68	238	307	1	110
SIMPSONVILLE POLICE DEPT.	0	97	161	258	0	181
SOCIETY HILL POLICE DEPT.	0	5	5	10	0	7
SOUTH CONGAREE POLICE DEPT.	2	14	26	42	2	28
SPARTANBURG COUNTY SHERIFF	0	5	13	18	0	6
PAGE TOTAL	23	2,413	6,646	9,082	23	3,870

TRAFFIC ACCIDENTS INVESTIGATED BY JURISDICTION
1990 (cont.)

JURISDICTION	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
SPARTANBURG POLICE DEPT.	4	704	1,630	2,338	4	1,209
SPRINGDALE POLICE DEPT.	0	28	67	95	0	42
SPRINGFIELD POLICE DEPT.	0	3	8	11	0	5
ST. GEORGE POLICE DEPT.	1	9	42	52	1	14
ST. MATTHEWS POLICE DEPT.	0	6	6	12	0	9
ST. STEPHENS POLICE DEPT.	1	17	29	47	1	21
STUCKEY POLICE DEPT.	0	0	1	1	0	0
SULLIVANS ISLAND POLICE DEPT.	0	21	85	106	0	33
SUMMERTON POLICE DEPT.	0	6	12	18	0	12
SUMMERVILLE POLICE DEPT.	3	170	478	651	3	283
SUMTER COUNTY SHERIFF	0	0	3	3	0	0
SUMTER POLICE DEPT.	2	290	913	1,205	2	487
SURFSIDE BEACH POLICE DEPT.	0	48	167	215	0	75
SWANSEA POLICE DEPT.	0	8	27	35	0	13
TEGA CAY POLICE DEPT.	0	3	14	17	0	4
TIMMONSVILLE POLICE DEPT.	0	11	26	37	0	26
TRAVELERS REST PUBLIC SAFETY	0	35	120	155	0	53
TURBEVILLE POLICE DEPT.	0	0	5	5	0	0
UNION POLICE DEPT.	0	84	207	291	0	144
USC AT SPARTANBURG PD.	0	2	7	9	0	2
VANCE POLICE DEPT.	1	1	3	5	1	3
VARNVILLE POLICE DEPT.	0	11	13	24	0	14
WAGENER POLICE DEPT.	0	6	1	7	0	9
WALHALLA POLICE DEPT.	1	28	78	107	2	43
WALTERBORO POLICE DEPT.	1	114	258	373	1	209
WARE SHOALS POLICE DEPT.	0	15	28	43	0	23
WELLFORD POLICE DEPT.	0	20	22	42	0	36
WEST COLUMBIA POLICE DEPT.	1	175	465	641	1	310
WEST UNION POLICE DEPT.	0	1	2	3	0	1
WESTMINISTER POLICE DEPT.	1	12	63	76	1	15
WHITMIRE POLICE DEPT.	0	3	16	19	0	3
WHITTEN CENTER POLICE DEPT.	0	0	2	2	0	0
WILLIAMSTON POLICE DEPT.	0	33	66	99	0	49
WILLISTON POLICE DEPT.	0	9	28	37	0	14
WINNSBORO POLICE DEPT.	0	27	83	110	0	54
WOODRUFF POLICE DEPT.	0	29	59	88	0	54
YEMASSEE POLICE DEPT.	0	4	17	21	0	10
YORK POLICE DEPT.	1	83	159	243	2	124
PAGE TOTAL	17	2,016	5,210	7,243	19	3,403
GRAND TOTAL	885	29,776	88,328	118,989	983	48,337

TRAFFIC ACCIDENTS BY HARMFUL EVENT LOCATION - 1990

	TYPE ACCIDENT				PERSONS	
ON TRAFFICWAY	Fatal	Injury	PDO	Total	Killed	Injured
ON ROADWAY						
AT INTERSECT	159	10,917	28,304	39,380	181	19,299
AT INTERSECT IN CRSWLK	0	164	457	621	0	270
NONJUNCTION	437	11,833	42,651	54,921	489	18,940
NONJUNCTION IN CRSWLK	1	23	103	127	1	35
ON ISLAND	1	28	103	132	1	47
ON ISLAND CRSWLK	0	3	10	13	0	5
INTERCHANGE RAMP	1	147	555	703	1	225
OTHER	15	1,043	3,575	4,633	15	1,716
OFF ROADWAY						
MEDIAN	12	188	557	757	12	262
ISLAND	0	15	56	71	0	21
SHOULDER LEFT	42	793	1,598	2,433	46	1,080
SHOULDER RIGHT	51	1,202	2,997	4,250	58	1,702
DRWY ACCESS	4	250	1,034	1,288	4	363
DRWY ACCESS IN CRSWLK	0	9	31	40	0	11
ROADSIDE, LEFT	61	1,018	1,684	2,763	66	1,371
ROADSIDE, RIGHT	62	1,377	2,817	4,256	66	1,923
SIDEWALK, LEFT	2	36	79	117	2	51
SIDEWALK, RIGHT	1	64	138	203	1	87
OTHER	10	228	761	999	12	320
OFF TRAFFICWAY						
OUTSIDE TRFWY, LEFT	13	170	281	464	14	235
OUTSIDE TRFWY, RIGHT	12	241	456	709	13	338
NOT STATED	1	27	81	109	1	36
TOTALS	885	29,776	88,328	118,989	983	48,337

Note: Abbreviations - INTERSECT=INTERSECTION, CRSWLK=CROSSWALK, DRWY=DRIVEWAY, TRFWY=TRAFFICWAY.

In 1990 the leading Harmful Event Location, by a wide margin, for both fatal and non-fatal accidents was "On Roadway - Nonjunction". These are accidents which occurred on the roadway at any location besides an intersection, island or ramp. Slightly less than half of the fatal accidents and just under half of the property damage only accidents occurred at a Nonjunction. The second leading Harmful Event Location was at an Intersection. Nearly 1/3 of the property damage accidents were at an intersection. A smaller percentage of the fatal accidents (17.97%) were at an intersection. A much larger proportion of fatal accidents occurred off the roadway. Off-Roadway and Off-Trafficway accidents accounted for 25.99% of all accidents involving fatalities, compared to only 14.14% of the property damage only accidents.

MOTOR VEHICLE ACCIDENTS OCCURRING IN CONSTRUCTION WORK AREAS 1988 - 1990

YEAR	HIGHWAY CLASSIFICATION	TOTAL ACCIDENTS	PERSONS KILLED	PERSONS INJURED
1988	Interstate	230	0	49
	U.S. Primary	249	3	139
	S.C. Primary	185	1	58
	Secondary	180	1	74
	County	37	0	9
	Other Public	1	0	0
	1988 Total	**891**	**5**	**329**
1989	Interstate	297	1	90
	U.S. Primary	148	1	58
	S. C. Primary	130	1	69
	Secondary	154	1	74
	County	50	0	15
	Other Public	2	0	1
	1989 Total	**781**	**4**	**307**
1990	Interstate	170	5	43
	U.S. Primary	159	1	68
	S.C. Primary	99	2	33
	Secondary	171	2	61
	County	43	0	9
	1990 Total	**643**	**10**	**214**

The majority of accidents in Construction Work Zones occurred on dry pavement, during clear weather conditions and during daylight hours. The leading probable causes of accidents in Construction work Zones were inattention, following too closely, failure to yield right of way and exceeding the speed limit.

The number of accidents occurring in construction work areas declined by 138 or 17.7% in 1990, dropping from 781 accidents to 643. A total of 2,315 accidents occurred in construction work areas during the three year period of 1988 through 1990. This represents 0.6% of all traffic accidents during this three year period. A total or 19 persons were killed in these accidents; ten were killed in 1990. This represents 0.6% of all traffic fatalities reported during the three year period and 1.0% for 1990.

D. Environment

The environment in which motorists operate their vehicles can contribute to the occurrence of traffic accidents. Environment is defined herein as the combination of external or extrinsic physical conditions that affect and influence the operation of a motor vehicle. These include, surface, weather, light conditions, traffic control, road character and road defect. In addition to these six environmental factors, the "locale" through which the roadway passes may also impact the motoring environment. These locale factors are as follows:

Locale	Accidents #	Accidents %
Open Country	40,891	34.4
Residential	24,990	21.0
Shopping or Business	49,326	41.4
Manufacturing/Industrial	1,439	1.2
School or Playground	1,799	1.5
Hospital	419	0.4
Not Stated	125	0.1
TOTAL	**118,989**	**100.0**

One or more of the environmental factors can be the primary cause of an accident or may be a contributing factor in a given accident. Weather, light and surface conditions are substantially beyond the control of engineering or law enforcement efforts. The other three factors are a function of the resources applied to highway construction. Over time, traffic control, road character and road defect factors have improved on the state's highways. This is reflected in reduced accidents and fatalities per 100 million miles of vehicle travel.

As reflected in the statistics on the next three pages, most accidents occur under the most favorable environmental conditions: dry roadway (79.4%), clear weather (73.5%), daylight (70.2%), straight-level roadway (73.1%), no road defect (98.1%) and no traffic control device (63.5%).

For fatal accidents, the percentages of accidents which occurred under the most favorable surface and weather conditions were even higher. For the light and road character factors, fatal accidents occurred at higher percentages under the less than favorable conditions than for all accidents. The percentage of fatal accidents occurring under the most favorable environmental conditions are as follows: dry roadway (82.3%), clear weather (76.7%), daylight (44.5%), straight-level roadway (57.1%), no road defect (98.0%) and no traffic control (75.7%).

Environmental factors were the probable cause in only 5.45% of all accidents. The environment may have been a contributing factor to accidents where it was not the primary probable cause. Efforts to improve those environmental factors which can be controlled (especially traffic control, road character and road defect) should help to reduce the frequency of accidents in South Carolina.

ENVIRONMENTAL CONDITIONS - ALL AND FATAL ACCIDENTS

1990

SURFACE CONDITIONS

SURFACE CONDITIONS	ALL ACCIDENTS		FATAL ACCIDENTS	
	#	%	#	%
Dry	94,513	79.43	729	82.38
Wet	24,078	20.23	150	16.95
Icy	20	0.02	1	0.11
Slushy	9	0.01	0	0.00
Snowy	27	0.02	0	0.00
Muddy	76	0.06	0	0.00
Debris	45	0.04	1	0.11
Other	221	0.19	4	0.45
Total	118,989	100.00	885	100.00

Nearly 4 out of 5 reported traffic accidents occurred on dry pavement in 1990. An even greater proportion (more than 4 out of 5) of the fatal accidents occurred on dry pavement. Less than 1 percent of all accidents occurred on icy, slushy, or snowy pavement.

WEATHER CONDITIONS

WEATHER CONDITIONS	ALL ACCIDENTS		FATAL ACCIDENTS	
	#	%	#	%
Fog, Smoke, Smog	1,895	1.59	26	2.94
Hail	52	0.04	0	0.00
High Wind	110	0.09	0	0.00
Clear	87,442	73.49	679	76.72
Cloudy	12,203	10.26	96	10.85
Rain	17,187	14.45	83	9.38
Snow, Sleet	13	0.01	1	0.11
Other	87	0.07	0	0.00
Total	118,989	100.00	885	100.00

More than 4 out of 5 accidents occurred in clear or cloudy weather conditions. Slightly less than 1 out 7 occurred in rainy weather. Traffic accidents in all other weather conditions accounted for slightly more than 1 in 55 accidents. The percentage of fatal accidents occurring in clear or cloudy weather is even higher, accounting for nearly 88% of the total. Fatal accidents in rainy weather accounted for slightly less than 1 out of every 10 reported fatal accidents.

ENVIRONMENTAL CONDITIONS - ALL AND FATAL ACCIDENTS

1990

LIGHT CONDITIONS

LIGHT CONDITIONS	ALL ACCIDENTS #	ALL ACCIDENTS %	FATAL ACCIDENTS #	FATAL ACCIDENTS %
Daylight	83,492	70.17	394	44.52
Dawn	1,419	1.19	22	2.49
Dusk	2,889	2.43	23	2.60
Dark (Lighting Unspecified)	3,667	3.08	45	5.09
Dark (Street Lamps Lit)	10,386	8.73	75	8.47
Dark (Street Lamps not Lit)	682	0.57	11	1.24
Dark (No Lights)	16,430	13.81	315	35.59
Unknown	24	0.02	0	0.00
Total	118,989	100.00	885	100.00

More than 2 out of every 3 traffic accidents occurred in daylight. This comes in spite of the poorer visibility conditions associated with dawn, dusk or darkness. For fatal accidents, the percentage occurring in daylight falls sharply to 44.52%. Only 13.81% of all accidents occurred in dark lighting conditions with no street lamps. However, for fatal accidents, the proportion occurring in darkness was much higher with 35.59% of the total.

TRAFFIC CONTROLS

TRAFFIC CONTROLS	ALL ACCIDENTS #	ALL ACCIDENTS %	FATAL ACCIDENTS #	FATAL ACCIDENTS %
Stop Sign	16,303	13.70	104	11.75
Stop Signal	18,846	15.84	26	2.94
Yield Sign	2,128	1.79	6	0.68
Officer /Flagman	321	0.27	2	0.22
RR Gates/Lights	78	0.07	3	0.34
RR Lights	48	0.04	2	0.22
None	75,502	63.45	670	75.71
Other Sign	3,991	3.35	50	5.65
RR Crossbucks	58	0.05	3	0.34
Other	1,714	1.44	19	2.15
Total	118,989	100.00	885	100.00

In 1990, slightly less than 2/3 of all traffic accidents occurred at locations that had no traffic control. This percentage was even higher in fatal accidents, where sightly more than 3 out of 4 accidents took place where there was no traffic control device. Accidents occurring at locations controlled by a stop signal accounted for about 1 out of 6 accidents, but only 1 out of 34 accidents involving fatalities.

ENVIRONMENTAL CONDITIONS - ALL AND FATAL ACCIDENTS

1990

ROAD CHARACTER

ROAD CHARACTER	ALL ACCIDENTS		FATAL ACCIDENTS	
	#	%	#	%
Straight - Level	87,027	73.14	505	57.06
Straight - On Grade	16,664	14.00	133	15.03
Straight - Hillcrest	2,324	1.95	16	1.81
Curve - Level	8,040	6.76	138	15.59
Curve - On Grade	4,492	3.78	86	9.72
Curve - Hillcrest	372	0.31	6	0.68
Unknown	70	0.06	1	0.11
Total	118,989	100.00	885	100.00

In 1990 more than 73 percent of all accidents occurred on straight and level roadways. For fatal accidents only 57.06% occurred on straight and level roadways. The three "straight" categories combined accounted for 89.09% of all accidents but only 73.90% of the fatal accidents. The proportion of fatal accidents occurring on a curve (either level, on grade or on a hillcrest) was more than twice as great for fatal accidents (25.99%) as for non-fatal (10.85%).

ROAD DEFECT

ROAD DEFECT	ALL ACCIDENTS		FATAL ACCIDENTS	
	#	%	#	%
None	116,736	98.11	867	97.96
Shoulder Defect	275	0.23	3	0.34
Soft Shoulder	130	0.11	0	0.00
Low Shoulder	162	0.14	3	0.34
High Shoulder	60	0.05	0	0.00
Ruts, Holes, Bumps	488	0.41	2	0.23
Worn, Polished Surface	169	0.14	2	0.23
Construction/Maintenance	643	0.54	7	0.79
Other	326	0.27	1	0.11
Total	118,989	100.00	885	100.00

For all reported accidents in 1990, only 1.89% occurred on a road with some type of defect which contributed to the accident. The most common defect was "Road Under Construction/Maintenance" with 643 accounting for less than 1% of all accidents. An even higher percentage (97.96%) of fatal accidents occurred on roads with no defects contributing to the accident. Only 18 fatal accidents occurred on a defective road, 7 of these in a construction/maintenance area.

E. Vehicles

The consequences of a traffic accident are affected by the types of "units" (see definitions) which are involved. A collision between a relatively large unit, such as a truck tractor or train, and a smaller unit, such as a motorcycle or bicycle, transmits a substantially greater force to the smaller vehicle, and hence to its occupants or riders, than an accident between two vehicles of comparable size. This irrefutable law of physics probably accounts for the overrepresentation of certain "unit types" in fatal accidents in 1990. On the following pages, accidents involving different "unit types" are presented. Some of the key findings in this data are as follows:

- The most common unit involved in traffic accidents in 1990 was the automobile. Out of the 219,919 units involved in traffic accidents during the year, 165,656 were automobiles. This represents 75.3% of the total units.

- For fatal accidents, a much smaller percentage of units were automobiles. Of the 1,480 units involved in fatal accidents, 867 or 58.6% were automobiles. This represents 0.5% of the automobiles involved in traffic accidents in 1990.

- A total of 111 pedestrians were involved in fatal accidents in 1990. (106 of these were killed; five other pedestrians were involved in a fatal accident in which another person was killed.) This represents 7.7% of the 1,435 pedestrians involved in all traffic accidents, a proportion nearly **15 times** greater than for persons traveling in automobiles.

- Ten (10) railway trains were involved in traffic accidents resulting in fatalities. This represents 8.5% of the 118 trains involved in all traffic accidents during 1990, a percentage **16 times** greater than for automobiles. This represents the highest percentage of accidents resulting in fatalities of any of the unit types.

- Forty-nine (49) motorcycles were involved in fatal accidents in 1990. This represents 3.0% of all motorcycles involved in traffic accidents, **6 times** the rate for automobiles.

- A total of 108 truck tractors was involved in fatal accidents in 1990. This represents 2.1% of the truck tractors involved in accidents during the year, **4 times the rate for automobiles. This percentage is substantially higher than the 1.5% recorded in 1989.**

MOTOR VEHICLE REGISTRATIONS BY COUNTY

	1989		1990	
County	**Registrations**	**Percent**	**Registrations**	**Percent**
Abbeville	18,566	0.7	18,294	0.7
Aiken	96,250	3.8	100,180	3.9
Allendale	6,499	0.3	6,434	0.2
Anderson	115,772	4.6	117,320	4.6
Bamberg	10,300	0.4	10,229	0.4
Barnwell	15,114	0.6	15,310	0.6
Beaufort	54,675	2.2	57,206	2.2
Berkeley	82,371	3.3	87,032	3.4
Calhoun	10,463	0.4	10,700	0.4
Charleston	186,530	7.4	191,909	7.4
Cherokee	34,363	1.4	34,497	1.3
Chester	23,781	0.9	24,081	0.9
Chesterfield	27,792	1.1	28,064	1.1
Clarendon	18,440	0.7	18,751	0.7
Colleton	23,531	0.9	24,429	0.9
Darlington	42,640	1.7	43,478	1.7
Dillon	19,062	0.8	19,111	0.7
Dorchester	53,612	2.1	56,631	2.2
Edgefield	14,253	0.6	14,579	0.6
Fairfield	15,697	0.6	15,905	0.6
Florence	80,217	3.2	81,529	3.2
Georgetown	31,375	1.2	32,193	1.2
Greenville	253,463	10.0	256,133	9.9
Greenwood	46,332	1.8	46,723	1.8
Hampton	12,236	0.5	12,372	0.5
Horry	103,965	4.1	108,255	4.2
Jasper	9,697	0.4	9,805	0.4
Kershaw	37,289	1.5	37,690	1.5
Lancaster	42,464	1.7	42,765	1.7
Laurens	44,901	1.8	45,376	1.8
Lee	11,068	0.4	11,179	0.4
Lexington	141,249	5.6	144,213	5.6
McCormick	5,825	0.2	5,815	0.2
Marion	20,568	0.8	20,514	0.8
Marlboro	17,138	0.7	17,249	0.7
Newberry	27,066	1.1	27,139	1.1
Oconee	48,078	1.9	49,152	1.9
Orangeburg	60,007	2.4	60,839	2.4
Pickens	68,872	2.7	70,348	2.7
Richland	190,447	7.5	194,625	7.6
Saluda	14,172	0.6	14,175	0.6
Spartanburg	178,707	7.1	177,988	6.9
Sumter	65,548	2.6	66,476	2.6
Union	21,904	0.9	22,138	0.9
Williamsburg	23,210	0.9	23,360	0.9
York	101,615	4.0	104,789	4.1
STATE TOTALS	**2,527,124**	**100.0**	**2,576,980**	**100.0**

UNIT TYPES INVOLVED IN MOTOR VEHICLE TRAFFIC ACCIDENTS

1990

UNIT TYPE	TYPE ACCIDENT Fatal	 Injury	 PDO	 Total
Automobile*	867	41,180	123,609	165,656
Pickup Truck*	210	7,727	24,855	32,792
Truck Tractor*	108	997	3,941	5,046
Other Truck*	67	1,843	6,563	8,473
Motorcycle*	49	1,153	436	1,638
Moped	5	81	30	116
Pedalcycle	28	671	185	884
Minibike	0	9	1	10
Animal Drawn Vehicle	0	3	2	5
Animal (Ridden)	0	4	4	8
Pedestrian	111	1,140	184	1,435
Train	10	39	69	118
School Bus*	2	106	525	633
Passenger Bus*	2	112	380	494
Other**	13	307	996	1,316
Unknown (Hit & Run Only)*	8	171	1,116	1,295
TOTALS	1,480	55,543	162,896	219,919

A motor vehicle traffic accident is defined by the National Safety Council (NSC) as a motor vehicle accident in which: (1) the unstabilized situation originates on a trafficway or, (2) a harmful event occurs on a trafficway. Using the NSC definition, each of the unit types listed above was involved in an accident which included at least one motor vehicle. Units considered motor vehicles are denoted with an asterisk (*). Units denoted by (**) may or may not be a motor vehicle, depending on the means by which they were propelled. For units not considered motor vehicles, the accident included at least one other unit which was a motor vehicle.

A total of 165,656 (75.33%) of the 219,919 total units involved in South Carolina traffic accidents in 1990 were automobiles. Of these, 867 or approximately 0.52%, were involved in fatal accidents. This compares to 0.64% of the pickup trucks, 2.14% of the truck tractors, 2.99% of the motorcycles and 7.74% of the pedestrians.

The 165,656 automobiles involved in traffic accidents represent 9.16% of all automobiles registered in South Carolina during 1990. The 1,638 motorcycles represent 5.30% of all motorcycles registered during the year.

VEHICLE MANEUVER IN ALL ACCIDENTS

1990

MANEUVER	Number	Percentage
MOVEMENTS ESSENTIALLY STRAIGHT		
Moving Straight, Details Unknown	15,025	6.8
Straight Ahead In Proper Direction	60,711	27.6
O'taking Veh. on Left, Left of Center Line	1,457	0.7
O'taking Veh. on Left, Right of Center Line*	401	0.2
O'taking Veh. on Right	769	0.3
Straight Ahead in Left Turn Lane	204	0.1
Straight Ahead in Right Turn Lane	130	0.1
Changing Lanes to Left	2,368	1.1
Changing Lanes to Right	2,598	1.2
Merging From Left (Roadway Narrows on Left)	127	0.1
Merging From Right (Roadway Narrows on Right	308	0.1
On Wrong Side of Roadway	1,325	0.6
In Wrong Direction on One Way Roadway	96	0.0
Swerving To Left	7,559	3.4
Swerving To Right	8,232	3.7
Slowing or Stopping	16,892	7.7
Skidding Longitudinally	17,975	8.2
Skidding Laterally	3,606	1.6
Spinning or Yawing	2,858	1.3
Jack Knifing	244	0.1
Stopped in Traffic	20,518	9.3
Starting From Stop	5,743	2.6
Increased Speed	634	0.3
TURNING MOVEMENTS		
Turning Details Unknown	1,056	0.5
Left, From Left Turn Bay	2,718	1.2
Left, From Left (Proper) Lane	11,944	5.4
Left, From Other Lane, Legal	3,681	1.7
Left, From Other Lane, Illegal	1,240	0.6
Left, From Unknown Lane	251	0.1
U-Turn	1,063	0.5
Right From Special Lane	144	0.1
Right From Right (Proper) Lane	4,010	1.8
Right From Other Lane, Legal	698	0.3
Right From Other Lane, Illegal	887	0.4
Right From Unknown Lane	124	0.1
ENTERING TRAFFIC LANE		
Entering Traffic Lane, Details Unknown	881	0.4
From Entrance Ramp On Left	131	0.1
From Entrance Ramp On Right	426	0.2
From Shoulder, On Left	181	0.1
From Shoulder, On Right	523	0.2
From Parking Space At Left Curb	46	0.0
From Parking Space At Right Curb	258	0.1
From Driveway On Left	781	0.4
From Driveway On Right	2,396	1.1

VEHICLE MANEUVER IN ALL ACCIDENTS

1990 (cont.)

MANEUVER	Number	Percentage
LEAVING TRAFFIC LANE		
Leaving Traffic Lane, Details Unknown	353	0.2
To Exit Ramp On Left	32	0.0
To Exit Ramp On Right	99	0.0
To Shoulder On Left	732	0.3
To Shoulder On Right	1,376	0.6
To Parking Space At Left Curb	70	0.0
To Parking Space At Right Curb	152	0.1
To Driveway On Left	382	0.2
To Driveway On Right	290	0.1
PARKING ON OR ADJACENT TO TRAFFIC LANE		
Parking, Details Unknown	252	0.1
On Left Shoulder	140	0.1
On Right Shoulder	527	0.2
At Left Curb	89	0.0
At Right Curb	412	0.2
In Traffic Lane On Left (Rural)	40	0.0
In Traffic Lane On Right (Rural)	97	0.1
Double Parked On Left	6	0.0
Double Parked On Right	19	0.0
MISCELLANEOUS MOVEMENTS		
Other Miscellaneous, Details Unknown	517	0.2
Backing in Roadway	2,712	1.2
Backing From Angle, Parking On Left	214	0.1
Backing From Angle, Parking On Right	501	0.2
Backing Across Traffic	672	0.3
Backing On Shoulder	160	0.1
Vehicle Pushed By Other Vehicle	273	0.1
Vehicle Pushed By Pedestrian	30	0.0
Driverless Vehicle In Motion	260	0.1
Not In Motion (Parked, Abandoned, Or Standing)	3,753	1.7
Unknown	1,092	0.5
Not Applicable (I.E. for a Pedestrian)	1,448	0.7
TOTAL	219,919	100.0

* - Applies to one way streets only.

By far the most frequent vehicle maneuver for vehicles involved in traffic accidents in 1990 was "Straight Ahead in the Proper Direction" with 27.6% of the total units. The next maneuver, "Stopped in Traffic", accounted for 9.3% of the units. The third, fourth and fifth maneuvers involved vehicles which were "Skidding Longitudinally" (8.2%), followed by "Slowing or Stopping" (7.7%) and "Moving Straight, Details Unknown" (6.8%). Combined, the top five categories accounted for almost 60% of all vehicles involved in traffic accidents.

MOTORCYCLE STATISTICS IN SOUTH CAROLINA

1967-1990

YEAR	TOTAL ACCIDENTS	FATAL ACCIDENTS	PERSONS KILLED	PERSONAL INJURY ACCIDENTS	PERSONS INJURED	PROPERTY DAMAGE ACCIDENTS	MOTORCYCLE REGISTRATIONS	REGISTRATION DEATH RATE[1]	REGISTRATION ACCIDENT RATE[2]
1967[3]	368	9	10	238	304	121	11,945	8.4	3.1
1968[4]	280	9	9	194	230	77	12,143	7.4	2.3
1969	272	8	9	191	231	73	12,924	7.0	2.1
1970	607	15	15	348	433	244	15,633	9.6	3.9
1971	907	22	23	506	599	379	17,870	12.9	5.1
1972	1,223	37	39	684	814	501	22,515	17.3	5.4
1973[5]	1,958	49	50	1,046	1,232	863	33,268	15.0	5.9
1974	2,319	59	60	1,225	1,468	1,035	47,328	12.7	4.9
1975[6]	1,913	51	54	1,001	1,186	861	48,040	11.2	4.0
1976	1,835	47	47	947	1,171	814	45,686	10.3	4.0
1977	1,765	51	53	903	1,067	809	41,161	12.9	4.3
1978	1,561	38	38	849	1,011	673	35,280	10.8	4.4
1979	1,543	40	42	890	1,063	611	37,466	11.2	4.1
1980[7]	1,764	54	55	986	1,165	723	38,875	14.1	4.5
1981	1,934	45	46	1,107	1,315	781	42,257	10.8	4.6
1982	2,019	58	61	1,135	1,382	823	35,028	17.4	5.8
1983	2,091	74	81	1,110	1,368	905	36,130	22.0	5.8
1984	2,593	89	92	1,376	1,648	1,122	37,119	24.8	7.0
1985	2,432	83	87	1,361	1,636	988	37,366	23.3	6.5
1986	2,284	73	75	1,281	1,535	929	36,074	20.8	6.3
1987	1,908	54	56	1,081	1,282	771	32,710	17.1	5.8
1988	1,580	62	63	1,134	1,415	384	31,483	20.3	5.0
1989	1,359	44	46	900	1,130	415	29,965	15.4	4.5
1990	1,612	49	51	1,135	1,407	428	30,907	16.5	5.2

---

1 - Based on 10,000 cycle registrations.
2 - Based on 100 cycle registrations.
3 - Safety Equipment Law enacted but not enforced.
4 - Enforcement of Safety Equipment Law initiated.
5 - Lights On Law effective July 1.
6 - Implemented Classified License Law for motorcycles.
7 - Helmet and Goggles Law amended effective June 17, exempting cyclists age 21 and older.

TRAFFIC ACCIDENTS INVOLVING MOTORCYCLES

1990

TYPE ACCIDENT	ACCIDENTS	PERCENTAGE
Fatal	49	3.04
Injury	1,135	70.41
Property Damage Only (PDO)	428	26.55
TOTAL	1,612	100.00

Casualties

Persons Killed: 51* Persons Injured*: 1,407

Motorcycle Accidents by Month

	TYPE ACCIDENT				PERSONS	
MONTH	Fatal	Injury	PDO	Total	Killed*	Injured*
January	0	46	17	63	0	52
February	0	59	23	82	0	68
March	6	65	38	109	6	88
April	2	130	34	166	2	169
May	5	121	43	169	6	144
June	7	145	54	206	7	188
July	7	137	51	195	7	166
August	5	136	43	184	6	173
September	8	104	42	154	8	126
October	6	92	38	136	6	113
November	2	66	31	99	2	83
December	1	34	14	49	1	37
TOTALS	49	1,135	428	1,612	51	1,407

Motorcycle Accidents by Light and Weather Conditions

	TYPE ACCIDENT				PERSONS	
LIGHT AND WEATHER	Fatal	Injury	PDO	Total	Killed*	Injured*
Day and Clear/Cloudy	19	637	245	901	21	782
Dark and Clear/Cloudy	30	457	159	646	30	576
Day and Rain	0	15	11	26	0	19
Dark and Rain	0	15	10	25	0	17
Day and Other Weather	0	4	1	5	0	6
Dark and Other Weather	0	7	2	9	0	7
TOTALS	49	1,135	428	1,612	51	1,407

There were a total of 1,638 motorcycles involved in the 1,612 motorcycle accidents which occurred in 1990. This indicates that some accidents had two or more cycles involved. These accidents took the lives of 51 persons, 50 of whom were drivers or passengers of a motorcycle. A total of 1,407 persons were injured in these accidents, 1,293 of whom were on a motorcycle. A total of 1,074 (66.63%) of the motorcycle accidents occurred during the period April 1 through September 30. This same six month period accounted for 34 (69.39%) of the fatal accidents.

The overwhelming majority of both total and fatal motorcycle accidents occurred during clear or cloudy weather conditions. A total of 1,547 (95.97%) motorcycle accidents occurred when there was no rain, snow or other bad weather. All of the fatal accidents occurred under these conditions.

Most (932/57.82%) motorcycle accidents occurred during daylight hours. For fatal accidents, 19 occurred during daylight hours; 30 at night, dawn or dusk.

* Includes all fatalities and injuries in the accident, not just to motorcycle riders.

TRAFFIC ACCIDENTS INVOLVING MOTORCYCLES

1990 (cont.)

Sex of Cyclists

	TYPE CASUALTY			
SEX	Fatality	Non Fatal Injury	Not Injured	Total
Male	45	1,150	480	1,675
Female	5	143	48	196
Unknown	0	0	4	4
TOTAL	50	1,293	532	1,875

Age and Helmet Usage of Cyclists

	TYPE CASUALTY			
HELMET USED	Fatality	Non Fatal Injury	Not Injured	Total
Under 15	0	12	5	17
15-20	3	158	71	232
21-24	1	91	44	136
25-34	2	93	43	138
35-44	4	39	12	55
45 and Over	0	35	11	46
SUBTOTAL	10	428	186	624
HELMET NOT USED				
Under 15	0	22	12	34
15-20	10	208	79	297
21-24	10	199	58	267
25-34	14	237	77	328
35-44	4	101	43	148
45 and Over	1	40	22	63
SUBTOTAL	39	807	291	1,137
UNKNOWN HELMET USAGE				
Under 15	0	2	2	4
15-20	1	9	12	22
21-24	0	11	10	21
25-34	0	21	14	35
35-44	0	7	6	13
45 and Over	0	8	11	19
SUBTOTAL	1	58	55	114
TOTALS	50	1,293	532	1,875

Out of the 50 motorcycle riders killed in 1990, 45 were male, 25 were under age 25 and 39 were not wearing a helmet. Out of the 1,875 riders of motorcyclists who were involved in traffic accidents, 624 were wearing a helmet, and 1,137 were not; for 114 riders, helmet usage was unknown. For those cyclists under 21 years of age, helmet usage is required by law. For this group, 249 were wearing a helmet and 331 were not wearing a helmet; for 26, helmet usage was unknown.

One out of every 62 helmeted motorcycle riders who were involved in a traffic accident was killed in 1990, compared to one out of every 29 unhelmeted riders. Without an in-depth examination of the types of injuries sustained in these fatal accidents, no conclusion can be drawn as to whether the use of a helmet could have prevented the deaths of these unhelmeted riders; however; if South Carolina's fatal motorcycle accidents parallel those represented in national studies examining the helmet issue (and there is no reason to suspect otherwise), it may be hypothesized that with increased helmet usage would come a reduction in the number of motorcycle fatalities and injuries resulting from head trauma.

TRAFFIC ACCIDENTS INVOLVING MOPEDS

1990

TYPE ACCIDENT	ACCIDENTS	PERCENTAGE
Fatal	5	4.35
Injury	80	69.57
Property Damage Only (PDO)	30	26.09
TOTAL	115	100.00

Casualties

Persons Killed: 5 Persons Injured*: 93

Moped Accidents by Month

MONTH	TYPE ACCIDENT Fatal	Injury	PDO	Total	PERSONS Killed	Injured*
January	0	5	2	7	0	7
February	0	4	0	4	0	4
March	0	4	7	11	0	5
April	2	7	0	9	2	8
May	0	12	2	14	0	14
June	0	8	1	9	0	9
July	0	9	2	11	0	11
August	1	6	4	11	1	8
September	0	7	4	11	0	8
October	1	8	3	12	1	9
November	0	7	2	9	0	7
December	1	3	3	7	1	3
TOTALS	5	80	30	115	5	93

Moped Accidents by Light & Weather Conditions

LIGHT/WEATHER	TYPE ACCIDENT Fatal	Injury	PDO	Total	PERSONS Killed	Injured*
Day and Clear/Cloudy	3	56	18	77	3	64
Dark and Clear/Cloudy	2	21	8	31	2	26
Day and Raining	0	1	2	3	0	1
Dark and Raining	0	0	2	2	0	0
Day and Other Weather	0	1	0	1	0	1
Dark and Other Weather	0	1	0	1	0	1
TOTALS	5	80	30	115	5	93

* Includes all injuries in the accident, not just to the moped rider.

TRAFFIC ACCIDENTS INVOLVING MOPEDS

1990 (cont.)

Age And Sex of Moped Riders

	TYPE CASUALTY							
AGE	Fatality		Non Fatal Injury		Not Injured		Total	
	M**	F	M	F	M	F	M	F
Under 10	0	0	0	0	1	0	1	0
10-11	0	0	2	1	0	1	2	2
12-15	0	0	10	1	5	1	15	2
16-20	0	0	7	1	5	0	12	1
21-30	0	0	20	1	5	1	25	2
Over 30	5	0	40	2	11	2	56	4
TOTALS	5	0	79	6	27	5	111	11

Moped Accidents: Who Contributed to The Accident?

	TYPE ACCIDENT			
Units Involved	Fatal	Injury	PDO	Total
Mopeds Contributing	2	40	22	64
Mopeds Not Contributing	3	41	8	52
Other Unit Contributing	3	40	8	51
Other Unit Not Contributing	0	35	22	57
TOTALS	8	156	60	224

** M - Male, F - Female

Traffic accidents involving mopeds tended to occur more often during warm weather months in 1990. During the summer months of June, July and August, 31 (26.96%) moped accidents were reported, compared to 18 accidents in the winter months of January, February and December. The five fatal accidents were randomly distributed throughout the year.

Eighty-one (70.43%) of the 115 accidents involving mopeds occurred during daylight hours. The vast majority, 108 (93.91%), occurred during clear or cloudy weather conditions. Only 7 moped accidents occurred during inclement weather.

Nearly half (60/49.18%) of the riders involved in moped accidents were over 30 years of age. Only five (4.10%) moped riders were under twelve; 17 (13.93%) were between 12 and 15 years old. Most of the riders (111/90.98%) were males. All of the moped fatalities were males.

There were a total of 116 mopeds involved in traffic accidents in 1990. There were a total of 108 other unit types involved in these accidents. Of the 116 mopeds, 64 (55.2%) contributed to the accident cause. Of the 108 other units involved in the accident, 51 (47.2%) contributed. In the five fatal accidents, two of the mopeds contributed and three did not. All three of the other units involved in fatal moped accidents contributed to the accident.

TRAFFIC ACCIDENTS INVOLVING BICYCLES

1990

TYPE ACCIDENT	ACCIDENTS	PERCENTAGE
Fatal	28	3.20
Injury	664	75.80
Property Damage Only (PDO)	184	21.00
TOTAL	876	100.00

Casualties

Persons Killed: 28 Persons Injured*: 707

Bicycle Accidents by Month

MONTH	TYPE ACCIDENT Fatal	Injury	PDO	Total	PERSONS Killed	Injured*
January	3	29	8	40	3	31
February	1	47	16	64	1	48
March	0	50	12	62	0	51
April	0	53	18	71	0	55
May	1	62	19	82	1	64
June	1	83	25	109	1	90
July	2	69	28	99	2	77
August	6	80	19	105	6	88
September	5	60	15	80	5	67
October	4	60	8	72	4	63
November	2	34	8	44	2	36
December	3	37	8	48	3	37
TOTALS	28	664	184	876	28	707

Bicycle Accidents by Light & Weather Conditions

LIGHT/WEATHER	TYPE ACCIDENT Fatal	Injury	PDO	Total	PERSONS Killed	Injured*
Day and Clear/Cloudy	10	486	139	635	10	511
Dark and Clear/Cloudy	15	143	37	195	15	158
Day and Raining	0	14	4	18	0	14
Dark and Raining	1	13	2	16	1	15
Day and Other Weather	2	4	2	8	2	4
Dark and Other Weather	0	4	0	4	0	5
TOTALS	28	664	184	876	28	707

* Includes all injuries in the accident, not just to the cyclists.

TRAFFIC ACCIDENTS INVOLVING BICYCLES

1990 (cont.)

Age and Sex of Cyclists**

AGE	TYPE CASUALTY Fatality M***	 F	 Non Fatal Injury M	 F	 Not Injured M	 F	 Total M	 F
Under 10	1	1	106	35	20	7	127	43
10-11	2	0	48	22	9	4	59	26
12-15	2	0	100	13	35	5	137	18
16-20	2	0	53	21	22	5	77	26
21-30	4	1	100	18	29	7	133	26
Over 30	14	1	141	13	39	4	194	18
TOTALS	25	3	548	122	154	32	727	157

** Bicycle accidents may involve more than one cyclist. Age and sex information was not recorded for some cyclists.

*** M - Male, F - Female

As with motorcycle and moped accidents, the largest proportions of bicycle accidents tend to occur during the warm weather months. More than twice as many bicycle accidents occurred in June, July and August (313) than in January, February and December (152). The three summer months accounted for 35.73% of all bicycle accidents; the three winter months, for 17.35%.

The vast majority, (830/94.75%) of all bicycle accidents occurred during clear or cloudy weather, including twenty-five of the twenty-eight fatal accidents. Most bicycle accidents occurred in the daylight hours (661/75.46%); however, sixteen of the twenty-eight (57.14%) fatal accidents took place at night.

The age of bicycle riders was fairly evenly distributed across all age groups. A total of 159 (17.99%) riders were between age 21 and 30; 212 (23.98%) were over 30 years of age; and 170 (19.23%) were under ten years of age; these were the top three age categories. Sixteen of the twenty-eight persons fatally injured were over 30 years of age; four were under age 12. A total of 727 (82.24%) of the cyclists were males. Twenty-five of the twenty-eight bicycle fatalities were males.

TRAFFIC ACCIDENTS INVOLVING SCHOOL BUSES

1990

School Bus Accidents 1986-1990

YEAR	Fatal	Injury	PDO	Total
	TYPE ACCIDENT			
1986	2	133	742	877
1987	1	130	769	900
1988	6	118	575	699
1989	2	124	558	684
1990	2	100	514	616

Summary of School Bus Accidents in 1990

TYPE ACCIDENT	ACCIDENTS	PERCENTAGE
Fatal	2	0.33
Injury	100	16.23
Property Damage Only (PDO)	514	83.44
TOTAL	616	100.00

Casualties

Persons Killed*: 4 Persons Injured**: 335

School Bus Accidents by Light & Weather Conditions

LIGHT/WEATHER	Fatal	Injury	PDO	Total	Killed*	Injured**
	TYPE ACCIDENT				PERSONS	
Day and Clear/Cloudy	0	73	433	506	0	269
Dark and Clear/Cloudy	1	4	23	28	2	7
Day and Raining	1	20	47	68	2	55
Dark and Raining	0	1	3	4	0	2
Day and Other Weather	0	1	7	8	0	1
Dark and Other Weather	0	1	1	2	0	1
TOTALS	2	100	514	616	4	335

Age of Bus Drivers

AGE	Fatal	Injury	PDO	Total
	TYPE ACCIDENT			
15-17	0	1	0	1
18-20	1	23	91	115
21-25	0	17	82	99
26-35	0	26	144	170
Over 35	1	36	193	230
Unknown	0	3	15	18
TOTAL DRIVERS	2	106	525	633

---

* All four fatalities were to occupants of vehicles other than the school bus.

** Includes all injuries in the accident, not just to school bus occupants.

TRAFFIC ACCIDENTS INVOLVING SCHOOL BUSES

1990 (cont.)

School Bus Accidents by Month

MONTH	TYPE ACCIDENT Fatal	Injury	PDO	Total	PERSONS Killed*	Injured**
January	0	8	68	76	0	18
February	0	8	44	52	0	31
March	0	11	50	61	0	38
April	0	6	52	58	0	7
May	0	16	74	90	0	64
June	0	2	9	11	0	6
July	0	2	3	5	0	2
August	0	2	19	21	0	2
September	1	11	50	62	2	32
October	1	14	65	80	2	36
November	0	11	44	55	0	83
December	0	9	36	45	0	16
TOTALS	2	100	514	616	4	335

---

* All four fatalities were to occupants of vehicles other than the school bus.

** Includes all injuries in the accident, not just school bus occupants.

The number of school bus accidents declined by 68 in 1990 compared to 1989, a 9.94% reduction. This continues a trend established in 1988. The number of Property Damage Only (PDO) accidents declined by 44 and the number of fatal accidents remained the same. Injury accidents decreased by twenty-four.

As would be expected, few school bus accidents occurred during the summer months; for example, only five accidents were reported in the month of July. The month with the most accidents was May with 90.

The vast majority of school bus accidents occurred during the daylight hours (582 or 94.48%). A total of 534 school bus accidents occurred in clear or cloudy weather conditions.

Beginning in 1988, drivers were required to be 18 years of age or older. This is reflected in the age of drivers involved in accidents. Only 1 of the 633 drivers was under 18 years of age. 36.33% of school bus drivers were over 35 years of age, the highest percentage of any group.

TRAFFIC ACCIDENTS INVOLVING PEDESTRIANS - 1990

TYPE ACCIDENT	ACCIDENTS	PERCENTAGE
Fatal	104	7.60
Injury	1,088	74.53
Property Damage Only (PDO)	176	12.87
TOTAL	1,368	100.00

Casualties

Persons Killed*: 107 Persons Injured*: 1,222

Pedestrian Accidents by Month

	TYPE ACCIDENT				PERSONS	
MONTH	Fatal	Injury	PDO	Total	Killed*	Injured*
January	3	81	13	97	3	92
February	9	86	11	106	9	88
March	5	107	17	129	5	121
April	5	86	10	101	5	97
May	13	94	16	123	13	106
June	12	70	17	99	12	94
July	11	72	18	101	11	77
August	10	94	9	113	10	103
September	8	103	15	126	9	117
October	10	99	18	127	10	111
November	11	82	13	106	13	90
December	7	114	19	140	7	126
TOTALS	104	1,088	176	1,368	107	1,222

Pedestrian Accidents by Light & Weather Conditions

	TYPE ACCIDENT				PERSONS	
LIGHT/WEATHER	Fatal	Injury	PDO	Total	Killed*	Injured*
Day and Clear/Cloudy	23	555	99	677	25	613
Dark and Clear/Cloudy	72	425	65	562	73	486
Day and Raining	1	37	5	43	1	41
Dark and Raining	5	46	6	57	5	56
Day and Other Weather	0	3	1	4	0	3
Dark and Other Weather	3	22	0	25	3	23
TOTALS	104	1,088	176	1,368	107	1,222

* Includes all fatalities and injuries occurring in the accident, not just to pedestrians.

Traffic accidents involving pedestrians tend to have a high proportion of fatalities. Of the 1,368 pedestrian accidents which occurred in 1990, 104 (7.60%) resulted in at least one fatality. In the 117,621 traffic accidents which did not involve pedestrians, 781 (0.66%) involved fatalities.

Pedestrian accidents were distributed fairly evenly throughout the year with the fewest (97) occurring in January; the most (140), in December. Most of the fatal accidents 80 (76.92%) occurred at night.

PEDESTRIAN CASUALTIES

1990

Action Taken by Pedestrians*

ACTION	PEDESTRIANS KILLED #	PEDESTRIANS KILLED %	PEDESTRIANS INJURED #	PEDESTRIANS INJURED %
Enter Or Crossing Specified Location	3	2.83	93	8.19
Entering Or Crossing Roadway	49	46.23	442	38.91
Entering/Crossing From Behind Vehicle	4	3.77	96	8.45
Walking With Traffic	14	13.21	82	7.22
Walking Against Traffic	5	4.72	42	3.70
Approaching Or Leaving Vehicle	1	0.94	15	1.32
Pushing Or Working On Vehicle	1	0.94	16	1.41
Working In Roadway	4	3.77	21	1.85
Standing	4	3.77	81	7.13
Playing In Roadway	1	0.94	32	2.81
Lying At Or In Location Specified	8	7.55	11	0.97
Sitting At Or In Location Specified	0	0.00	3	0.26
Other	2	1.89	35	3.08
Not Stated	10	9.44	167	14.70
TOTALS	106	100.00	1,136	100.00

Age and Sex of Pedestrians*

AGE	MALE K**	MALE I	FEMALE K	FEMALE I	TOTAL K	TOTAL I
Under 5	4	44	0	19	4	63
5-9	3	105	2	57	5	162
10-14	5	75	0	49	5	124
15-19	5	77	3	43	8	120
20-24	5	67	1	37	6	104
25-34	21	138	5	54	26	192
35-44	11	110	4	27	15	137
45-54	6	70	2	14	8	84
55-64	8	31	3	16	11	47
65-74	9	37	2	23	11	60
75 & Over	4	24	3	19	7	43
TOTALS	81	778	25	358	106	1,136

* There were 106 pedestrians killed in traffic in 1990. One driver also died, making a total of 107 persons killed in the 104 fatal accidents involving pedestrians. There were a total of 1,136 pedestrians injured in traffic accidents in 1990.

** K - Killed; I - Injured

The 25-34 age group had the most fatalities with 26. Most pedestrian fatalities were males, accounting for 81 (76.42%) of the 106 pedestrians killed in 1990. More males than females were killed in all of the eleven age categories.

TRAFFIC ACCIDENTS INVOLVING RAILWAY TRAINS

1990

Railway Train Accidents: 1986 - 1990

YEAR	Fatal	Injury	PDO	Total
	TYPE ACCIDENT			
1986	6	39	66	111
1987	6	30	88	124
1988	9	51	66	126
1989	13	55	67	135
1990	10	39	69	118

Casualties - 1990

Persons Killed: 10   Persons Injured: 51

Railway Train Accidents by Traffic Control Device

	TYPE ACCIDENT				PERSONS	
TYPE DEVICE	Fatal	Injury	PDO	Total	Killed	Injured
Stop Sign	0	9	10	19	0	12
Stop and Go Signal	0	0	1	1	0	0
Officer/Flagman	0	0	3	3	0	0
RR Crossbucks Only	3	9	21	33	3	9
RR Flashing Lights	2	10	10	22	2	17
RR Gates & Lights	3	2	11	16	3	2
Other Sign	0	0	2	2	0	0
No Traffic Control	2	9	11	22	2	11
TOTALS	10	39	69	118	10	51

Railway Train Accidents by Light & Weather Conditions

	TYPE ACCIDENT				PERSONS	
LIGHT/WEATHER	Fatal	Injury	PDO	Total	Killed	Injured
Day and Clear/Cloudy	5	22	35	62	5	26
Dark and Clear/Cloudy	5	11	21	37	5	17
Day and Raining	0	3	6	9	0	5
Dark and Raining	0	2	6	8	0	2
Day and Other Weather	0	0	1	1	0	0
Dark and Other Weather	0	1	0	1	0	1
TOTALS	10	39	69	118	10	51

TRAFFIC ACCIDENTS INVOLVING RAILWAY TRAINS

1990 (cont.)

Railway Train Accidents By Route Category

ROUTE CATEGORY	TYPE ACCIDENT Fatal	Injury	PDO	Total	PERSONS Killed	Injured
US Primary	1	7	5	13	1	10
SC Primary	2	3	9	14	2	8
State Secondary	6	23	47	76	6	26
County	1	6	8	15	1	7
Other	0	0	0	0	0	0
TOTALS	10	39	69	118	10	51

Railway trains were involved in 118 traffic accidents in 1990. Accidents involving trains accounted for only 0.10% of all reported accidents during the year. However, 10 of these accidents resulted in fatalities, representing 1.13% of all fatal traffic accidents in 1990. These fatal accidents resulted in 10 deaths or, 1.02% of the total fatalities. The 10 accidents involving fatalities accounted for 8.47% of all railway train accidents during the year. Traffic accidents involving trains resulted in a larger proportion of fatal accidents than for any other unit type except pedestrians.

Eighty (80) of the 118 accidents, including 5 of the fatal accidents, occurred at a crossing not containing flashing light signals.

A total of 99 accidents, including all of the fatal accidents, occurred during clear or cloudy weather conditions. More than half, 62 (52.54%) occurred during the day in clear or cloudy weather. Five of the 10 fatal accidents occurred at night.

A total of 76 (64.41%) accidents involving railway trains, including 6 of the fatal accidents, occurred on state secondary highways. The remaining 42 accidents were divided fairly equally among US primary roads (13/11.02%), SC primary roads (14/11.86%) and county roads (15/12.71%).

TRAFFIC ACCIDENTS INVOLVING TRUCK TRACTORS

1990

TYPE ACCIDENT	ACCIDENTS	PERCENTAGE
Fatal	99	2.04
Injury	950	19.61
Property Damage Only (PDO)	3,795	78.35
TOTAL	4,844	100.00

Casualties

Persons Killed*: 114 Persons Injured*: 1,460

Truck Tractor Accidents by Attachment Type**

	TYPE ACCIDENT				PERSONS	
ATTACHMENT	Fatal	Injury	PDO	Total	Killed*	Injured*
None	13	135	588	736	13	204
Mobile Home	0	2	41	43	0	3
Semi-Trailer	50	610	2,487	3,147	58	916
Utility Trailer	4	24	78	106	4	37
Farm Trailer	0	2	11	13	0	3
Trailer W/Boat	0	0	7	7	0	0
Towed Motor Vehicle	0	3	9	12	0	3
Petroleum Tanker	3	23	74	100	3	39
Lowboy Trailer	3	24	70	97	3	47
Auto Carrier Trailer	1	4	17	22	1	9
Other Tanker	2	14	44	60	3	23
Flat Bed	7	45	175	227	10	69
Other	14	52	138	204	16	89
Twin Trailer	1	6	32	39	1	8
Camper Trailer	0	1	2	3	0	2
Not Stated	1	5	22	28	2	8
TOTALS	99	950	3,795	4,844	114	1,460

Truck Tractor Accidents by Light & Weather Conditions

	TYPE ACCIDENT				PERSONS	
LIGHT/WEATHER	Fatal	Injury	PDO	Total	Killed*	Injured*
Day and Clear/Cloudy	55	607	2,716	3,378	65	945
Dark and Clear/Cloudy	29	213	593	835	32	329
Day and Raining	6	78	305	389	8	103
Dark and Raining	5	27	110	142	5	44
Day and Other Weather	1	15	40	56	1	24
Dark and Other Weather	3	10	31	44	3	15
TOTALS	99	950	3,795	4,844	114	1,460

---

* Includes all fatalities and injuries in the accident, not just to the passengers of the truck.

** Where there was more than one truck involved in the accident, the last unit listed on the accident report is used to identify the type attachment.

TRAFFIC ACCIDENTS INVOLVING TRUCK TRACTORS

1990 (cont.)

Truck Tractor Accidents by Route Category

ROUTE CATEGORY	TYPE ACCIDENT Fatal	Injury	PDO	Total	PERSONS Killed*	Injured*
Interstate	22	222	941	1,185	26	344
US Primary	43	366	1,355	1,764	52	592
SC Primary	26	215	722	963	28	311
State Secondary	8	130	671	809	8	192
County	0	17	106	123	0	21
TOTALS	99	950	3,795	4,844	114	1,460

* Includes all fatalities and injuries in the accident, not just to the passengers of the truck.

Truck tractors were involved in 4,844 traffic accidents in 1990. A total of 5,046 individual trucks were involved in these accidents. Accidents involving truck tractors accounted for 4.07% of all reported accidents during the year. Ninety-nine (99) of these accidents involved fatalities, representing 11.19% of all fatal traffic accidents in 1990. These fatal accidents resulted in 114 fatalities, 11.60% of the total traffic fatalities. The 4,844 accidents represent a decrease of 10.71% over 1989, when truck tractors were involved in 5,425 accidents. The 99 fatal accidents are 26.92% more than the 78 reported in 1989, and the 114 fatalities are 17.53% more than the 97 reported in 1989.

In 1987, and prior years, truck tractor accidents were tabulated only for trucks with the following attachments: semi-trailer, petroleum tanker, lowboy trailer, auto carrier trailer, other tanker, flatbed, and twin trailers. In 1990, there were 3,692 accidents involving trucks with these attachments. This total included 67 fatal accidents with 79 persons killed.

The 3,147 accidents involving at least one semi-trailer accounted for 64.97% of all truck tractor accidents. Trucks with no attachment accounted for the second highest number of accidents, with 15.19% of the total.

69.74% of the truck tractor accidents occurred during the daylight hours with clear or cloudy weather including 55.56% of the fatal accidents. 35.35% (35 of 99) of the fatal accidents occurred at night.

Approximately 36.42% of all truck tractor accidents occurred on US Primary routes. 43.43% of the fatal accidents occurred on U.S. primary routes. Only 22 fatal truck tractor accidents occurred on the interstates; these accidents resulted in 26 fatalities, which represent less than 3% of the state's 983 traffic fatalities in 1990.

PART III
ACCIDENT CONSEQUENCES

The consequences of traffic accidents extend beyond those persons directly affected and are measured in both human and economic terms. The economic costs consider that portion of financial loss born by society, i.e., medical costs, property damage, lost productivity, etc.. Opposite the economic losses are the intangible human costs associated with the grief and suffering that accompany a traffic death or injury. On the following pages, statistics related to estimated economic cost, traffic injuries, fatalities and restraint usage are presented. Some of the important observations in the 1990 data are as follows:

- For the third year in a row, economic losses (adjusted for inflation) declined statewide. This was the result of fewer accidents, injuries and fatalities.

- Males accounted for 72.3% of the fatalities and 58.1% of the incapacitating injuries. Both percentages were higher than in 1989.

- A total of 335 persons under the age of 25 were killed in traffic accidents, accounting for 34.1% of the total persons killed.

- There were 2,013 occupants of automobiles and trucks totally ejected form the vehicle in which they were riding. Of these, 175 or 8.7% were killed. Of the 294,965 occupants not ejected or trapped, 346 or 0.12% were killed. The percentage of fatalities suffered by ejected occupants was **72** times that of occupants not ejected or trapped.

- Out of 5,438 children under the age of 6 involved in traffic accidents who were reported to be restrained by a federally approved child safety seat, four were killed. Of the 1,611 children under six who were not restrained in any way, seven were killed.

- Of the 242,631 occupants of automobiles and trucks who were reported restrained by a safety belt, child seat or other protective equipment, 205 were killed and 2,758 sustained incapacitating injuries. Of the reported 45,358 unrestrained occupants of these same vehicle types, 519 were killed and 2,642 sustained incapacitating injuries. For the restrained occupants, 1 out of 1,184 was killed and 1 out of 88 sustained an incapacitating injury. For unrestrained occupants, 1 out of 87 was killed and 1 in 17 sustained an incapacitating injury.

ECONOMIC LOSS BY COUNTY*
1989 and 1990

COUNTY	1989	1990
Abbeville	$ 4,600,000	$ 4,200,000
Aiken	33,400,000	36,900,000
Allendale	2,800,000	2,800,000
Anderson	37,300,000	38,500,000
Bamberg	8,000,000	3,300,000
Barnwell	3,300,000	4,000,000
Beaufort	18,300,000	17,800,000
Berkeley	28,900,000	31,800,000
Calhoun	3,200,000	6,700,000
Charleston	88,300,000	88,100,000
Cherokee	15,300,000	12,600,000
Chester	10,100,000	8,000,000
Chesterfield	12,000,000	9,300,000
Clarendon	11,000,000	8,100,000
Colleton	11,800,000	19,600,000
Darlington	26,800,000	17,200,000
Dillon	13,700,000	11,300,000
Dorchester	19,800,000	22,000,000
Edgefield	4,500,000	4,900,000
Fairfield	5,800,000	6,200,000
Florence	30,700,000	29,100,000
Georgetown	13,300,000	16,000,000
Greenville	84,300,000	83,300,000
Greenwood	14,800,000	16,000,000
Hampton	5,100,000	2,500,000
Horry	50,600,000	50,600,000
Jasper	8,600,000	9,000,000
Kershaw	10,400,000	10,700,000
Lancaster	16,700,000	14,200,000
Laurens	13,600,000	17,000,000
Lee	5,100,000	5,300,000
Lexington	40,200,000	39,900,000
McCormick	1,900,000	2,400,000
Marion	10,100,000	10,300,000
Marlboro	8,300,000	7,100,000
Newberry	7,500,000	7,500,000
Oconee	15,500,000	13,300,000
Orangeburg	28,200,000	21,100,000
Pickens	19,300,000	17,800,000
Richland	74,500,000	71,900,000
Saluda	4,600,000	4,700,000
Spartanburg	63,300,000	57,000,000
Sumter	23,400,000	19,300,000
Union	6,600,000	7,500,000
Williamsburg	14,700,000	11,200,000
York	34,500,000	35,000,000
Totals	$ 964,700,000	$ 933,000,000

All figures are rounded to the nearest $100,000.

* Based on the 1990 National Safety Council Formula which applies the following factors:

Each fatality	$290,000
Each incapacitating injury	$ 32,000
Each nonincapacitating injury	$ 8,300
Each possible injury	$ 2,600
Each property damage only accident	$ 3,000

VICTIM PROFILE

INJURIES BY AGE AND SEX - 1990

SEX	AGE	NOT INJURED	INJURY TYPE*					TOTALS
			POSSIBLE	NON-INCAPACITATING	INCAPACITATING	KILLED	UNKNOWN INJURY	
	UNDER 4	3,879	390	87	44	6	4	4,410
	4-5	2,194	196	70	36	2	0	2,498
	6-9	3,316	439	170	83	10	7	4,025
M	10-14	4,532	603	238	132	17	4	5,526
	15-24	46,684	4,780	2,251	1,357	201	23	55,296
A	25-34	33,634	3,349	1,409	1,014	179	25	39,610
	35-44	22,178	1,988	726	574	115	12	25,593
L	45-54	12,808	1,035	374	252	55	12	14,536
	55-64	8,825	666	232	160	53	4	9,940
E	65-74	6,278	493	172	128	46	4	7,121
	75+	2,871	250	104	75	25	4	3,329
	UNKNOWN	2,173	202	61	40	2	69	2,547
	SUBTOTAL	149,372	14,391	5,894	3,895	711	168	174,431
F	UNDER 4	3,916	371	57	37	7	3	4,391
	4-5	2,041	177	67	31	3	3	2,322
E	6-9	3,417	483	117	66	5	10	4,098
	10-14	4,379	691	217	92	9	7	5,395
M	15-24	31,887	4,903	1,557	852	75	19	39,293
	25-34	24,309	3,706	1,007	668	51	15	29,756
A	35-44	16,840	2,518	639	423	43	9	20,472
	45-54	9,226	1,487	392	225	24	6	11,360
L	55-64	6,657	976	258	169	18	2	8,080
	65-74	5,318	759	213	132	18	2	6,442
E	75+	2,589	360	105	83	19	4	3,160
	UNKNOWN	1,168	222	45	28	0	22	1,485
	SUBTOTAL	111,747	16,653	4,674	2,806	272	102	136,254
U	UNDER 4	10	0	0	0	0	0	10
	4-5	2	0	0	0	0	0	2
N	6-9	4	0	0	0	0	0	4
	10-14	5	0	0	0	0	0	5
K	15-24	8	1	0	0	0	0	9
	25-34	6	0	0	0	0	0	6
N	35-44	2	0	0	0	0	0	2
	45-54	1	0	0	0	0	0	1
O	55-64	0	0	0	0	0	0	0
	65-74	3	1	0	0	0	0	4
W	75+	0	0	0	0	0	0	0
	UNKNOWN	423	21	1	0	0	18	463
N	SUBTOTAL	464	23	1	0	0	18	506
TOTALS		261,583	31,067	10,569	6,701	983	288	311,191

* See Definitions for a description of each injury type.

There were a total of 311,191 persons involved in traffic accidents statewide in 1990. This represents 8.92% of the state's 3.49 million population (1990 estimate). Of this total, 261,583 (84.06%) sustained no injury. An additional 31,067 (9.98%) sustained possible injuries, the least severe type. For an additional 288, there was no injury information reported. The remaining casualties, non-incapacitating, incapacitating and fatal injuries, accounted for 18,253 (5.87%) of all persons involved.

A total of 711 (72.33%) of all fatal injuries were sustained by males. This is up from 68.9% in 1989. Overall female traffic deaths decreased from 310 in 1990 to 272 in 1989 (12.26%), while male deaths increased by 3.64%.

The pattern of male/female injuries is consistent for most age groups. For both sexes, injuries and fatalities were greatest in the 15 to 24 age category.

INJURIES BY RESTRAINT USAGE

1990[1]

RESTRAINT USAGE	NOT INJURED	POSSIBLE	NON INCAPACITATING	INCAPACITATING	KILLED	UNKNOWN INJURY	TOTALS
		INJURY TYPE					
NO RESTRAINT USED							
NO SAFETY EQUIPMENT	6,208	1,280	563	360	61	3	8,475
LAP BELT NOT USED	7,550	1,390	532	418	69	5	9,964
LAP/SHOULDER HARNESS NOT USED	17,786	3,891	2,365	1,831	385	20	26,278
PASSIVE BELT/HARNESS NOT USED	56	21	8	5	1	0	91
CHILD/YOUTH SEAT NOT USED	387	81	38	28	3	0	537
AIR BAG NOT DEPLOYED	10	3	0	0	0	0	13
SAFETY BLANKET NOT DEPLOYED	0	0	0	0	0	0	0
SUBTOTAL	**31,997**	**6,666**	**3,506**	**2,642**	**519**	**28**	**45,358**
RESTRAINT USED							
LAP BELT USED	26,484	2,783	668	245	25	15	30,220
LAP/SHOULDER HARNESS USED	180,471	17,457	4,714	2,460	172	61	205,335
PASSIVE BELT/HARNESS USED	1,089	121	32	18	1	0	1,261
CHILD/YOUTH SEAT USED	5,201	398	60	25	5	6	5,695
AIR BAG DEPLOYED	59	20	9	10	2	0	100
SAFETY BLANKET DEPLOYED	4	0	0	0	0	0	4
SAFETY PADDING PRESENT	16	0	0	0	0	0	16
SUBTOTAL	**213,324**	**20,779**	**5,483**	**2,758**	**205**	**82**	**242,631**
UNKNOWN RESTRAINT USAGE	**10,634**	**1,661**	**435**	**277**	**55**	**102**	**13,164**
TOTALS	**255,955**	**29,106**	**9,424**	**5,677**	**779**	**212**	**301,153**

In 1990, there were a total of 301,153 automobile and truck occupants involved in traffic accidents. Of these, the restraint usage for 287,989 of the occupants was known: 242,631 were restrained and 45,358 were not restrained. In the unrestrained group, 8,475 were reported to have had no safety equipment available to them to use; the remaining 36,883 had a restraint device available to them but failed to use it. The unrestrained occupants represented only 15.1% of all reported occupants, less than half the percentage reported unrestrained in 1989. However, studies indicate that reported occupant restraint usage is higher than actual usage.[2] We should not, therefore, consider these figures as an actual reflection of restraint usage rates in South Carolina for 1990.

In the "not injured" category, 87% of the occupants with known restraint usage were restrained. For "possible" injuries 75.7% were restrained; reported restraint usage declined to 61% of the non-incapacitating injuries, 51.1% of the incapacitating injuries and finally to 28.3% of the fatal injuries. Some of this declining belt usage rate is due to improved reporting for the fatally injured occupants compared to occupants sustaining less severe injuries. Also, studies indicate persons involved in potentially fatal collisions tend to be less likely to wear a belt. Nevertheless, this data provides statistical evidence that safety equipment is useful in reducing injuries and fatalities.

---

1. Includes occupants seated inside the passenger compartment of automobiles and trucks only.

2. See NHTSA's A Model For Estimating Economic Savings From Increased Safety Belt Usage and South Carolina Safety Belt Study by Metromark Research.

AFTER IMPACT LOCATION - INJURIES SUSTAINED*

1990

	INJURY TYPE						
AFTER IMPACT LOCATION	NOT INJURED	POSSIBLE	NON INCAPACITATING	INCAPACITATING	KILLED	UNKNOWN INJURY	TOTALS
NOT EJECTED OR TRAPPED	252,855	28,104	8,876	4,708	346	76	294,965
TOTAL EJECTION	790	332	236	479	175	1	2,013
PARTIAL EJECTION	50	69	78	111	66	0	374
TRAPPED	25	93	143	310	182	0	753
UNKNOWN	2,235	508	91	69	10	135	3,048
TOTAL	**255,955**	**29,106**	**9,424**	**5,677**	**779**	**212**	**301,153**

INJURIES SUSTAINED BY CHILDREN UNDER SIX YEARS OF AGE - 1990**

	INJURY TYPE						
RESTRAINT	NOT INJURED	POSSIBLE	NON INCAPACITATING	INCAPACITATING	KILLED	UNKNOWN INJURY	TOTALS
CHILD SAFETY SEAT USED	4,977	376	57	21	4	3	5,438
OTHER RESTRAINT USED	5,346	380	90	31	1	1	5,849
NO RESTRAINT USED	1,228	243	82	51	7	0	1,611
UNKNOWN RESTRAINT USAGE	243	45	8	2	0	4	302
TOTALS	**11,794**	**1,044**	**237**	**105**	**12**	**8**	**13,200**

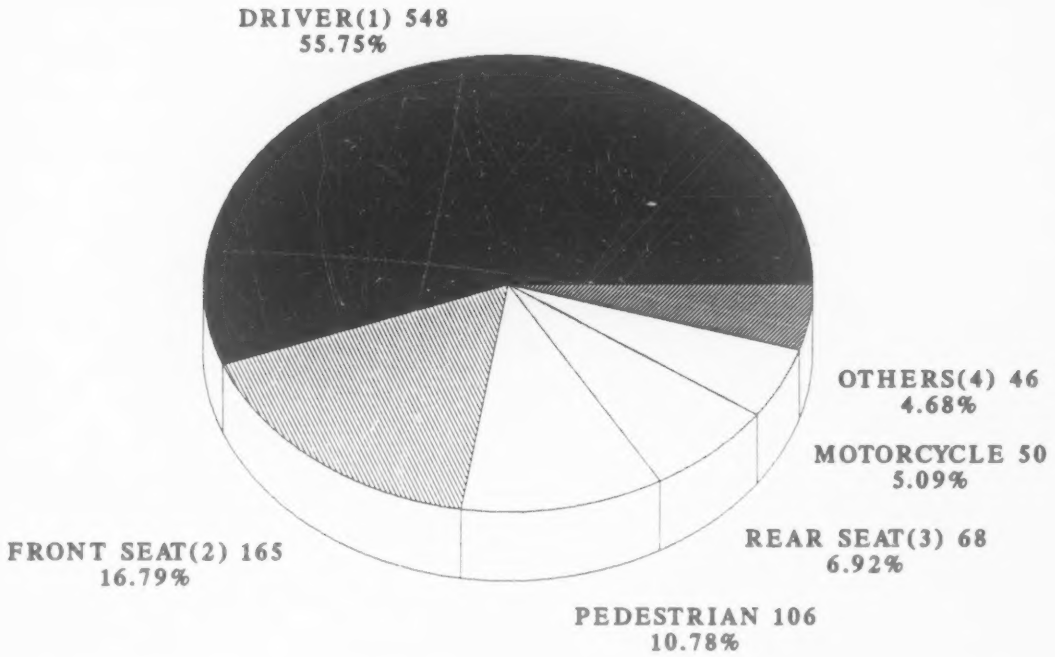
* Occupants of automobiles and trucks only.

** Includes only children seated inside the vehicle.

There were a total of 301,153 occupants of automobiles and trucks involved in traffic accidents in 1990. Most of these persons (255,955) sustained no injuries. The vast majority of these occupants (294,965/97.9%) were not ejected from nor trapped in the vehicle. Of these, 346 were killed, comprising 1 out of every 853 of these occupants. Of the 2,013 occupants totally ejected, 175 or 1 in 12 were killed. For the 753 trapped occupants, 182 or about 1 in 4 was killed.

In 1990, 13,200 children under 6 years of age were involved in traffic accidents in South Carolina. This does not include children who were either pedestrians or occupants seated outside the vehicle (such as on the hood of a car). A total of 5,438 (41.2%) were restrained by a Federally approved child safety seat. An additional 5,849 (44.3%) were restrained with a seat belt or seat belt/shoulder harness combination. These figures indicate a reported compliance rate (with the South Carolina Child Restraint Law) of approximately 85%. Of those children restrained by a child safety seat, 4 were killed. One child restrained by a belt was killed and seven unrestrained children died. The fatality rate for unrestrained children was 1 in every 230 children compared to 1 in every 1,360 in a safety seat and 1 in every 5,849 belted children.

FATALITIES BY SEATING LOCATION
1990



(1) INCLUDES DRIVERS OF ALL AUTOMOBILES, TRUCKS AND BUSES
(2) FRONT SEAT PASSENGERS OF AUTOS, TRUCKS AND BUSES
(3) REAR SEAT PASSENGERS OF AUTOS, TRUCKS AND BUSES
(4) INCLUDES BICYCLISTS, MOPED RIDERS AND PERSONS ON THE OUTSIDE OF THE VEHICLE

PART IV

ALCOHOL & DRUGS

Alcohol-related traffic accidents are responsible for a large portion of reported traffic accidents each year. The percentage of accidents which are alcohol-related increases as the severity of injuries involved increases. On the following pages accident statistics are presented which are based on the probable accident cause as determined by the officers who investigate the traffic accidents. Accidents listed by county and driver involvement are not comparable to any statistics published prior to 1988. In previous years, alcohol and drug involvement was based on a question contained in the Uniform Traffic Accident Report for each driver, "Had been drinking or using drugs". Beginning with 1988, the alcohol and drug accidents are based on the probable cause field which lists 74 causes from which the investigating officer must choose the single probable cause in the accident. Eight of these choices concern alcohol or drug usage.

The data presented here is a summary of these eight alcohol or drug-related probable causes. This data will not include any accidents where the probable cause was something other than alcohol or drugs, even if one of the drivers was intoxicated. For example, if a drunk driver runs a stop sign and this results in a traffic accident, the officer may choose to indicate "disregarding sign or signal" as the probable cause. As a result, alcohol involvement in South Carolina traffic accidents is probably understated in this data.

Despite the restrictive nature in which this data was compiled, these figures indicate alcohol and drugs are important contributors to the frequency and severity of traffic accidents. Some of the key findings in the alcohol/drug data are as follows:

- Alcohol or drug usage was the probable cause in 207 fatal accidents in 1990, resulting in the deaths of 226 persons. Both figures are up from 1989 and represent 23.4% and 23.0% respectively of all fatal accidents and persons killed during the year. These proportions are considerably higher than the 4.4% of accidents which were caused by alcohol or drugs in property damage only accidents.

- In 1990 drivers under 21 years of age accounted for 13.4% of all drivers whose age was known in accidents with a probable cause of alcohol or drugs. This is up from 12.6% in 1989.

- Blood alcohol data is compiled for drivers and pedestrians, who were over 16 years of age and died within 4 hours of a traffic accident. For 1989, the latest year for which complete data is available, 59.7% of all known test results on these victims indicated a positive blood alcohol content.

TRAFFIC ACCIDENTS IN SOUTH CAROLINA WITH A PROBABLE CAUSE OF ALCOHOL OR DRUGS*

1990

	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
COUNTY	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
Abbeville	0	16	22	38	0	21
Aiken	4	84	121	209	4	141
Allendale	1	9	7	17	1	19
Anderson	15	103	129	247	17	179
Bamberg	0	11	9	20	0	15
Barnwell	2	16	20	38	2	25
Beaufort	5	44	70	119	5	68
Berkeley	10	88	138	236	11	137
Calhoun	2	12	16	30	2	18
Charleston	21	290	319	630	23	469
Cherokee	2	52	66	120	2	78
Chester	6	32	33	71	6	66
Chesterfield	0	41	26	67	0	70
Clarendon	0	18	24	42	0	22
Colleton	4	32	56	92	5	44
Darlington	4	98	64	166	4	147
Dillon	2	31	32	65	2	57
Dorchester	4	50	69	123	4	86
Edgefield	2	11	9	22	2	20
Fairfield	2	23	18	43	2	40
Florence	7	100	130	237	9	164
Georgetown	2	52	61	115	2	86
Greenville	16	289	399	704	16	472
Greenwood	1	50	63	114	2	81
Hampton	0	5	19	24	0	8
Horry	14	174	247	435	17	303
Jasper	2	13	32	47	2	18
Kershaw	4	46	62	112	5	68
Lancaster	7	77	55	139	9	121
Laurens	3	59	59	121	3	99
Lee	1	18	15	34	1	24
Lexington	4	144	175	323	4	225
McCormick	0	6	12	18	0	10
Marion	1	25	42	68	1	34
Marlboro	1	20	23	44	1	32
Newberry	2	24	40	66	2	49
Oconee	3	33	59	95	3	62
Orangeburg	1	49	81	131	1	79
Pickens	3	65	115	183	3	93
Richland	4	258	317	579	4	415
Saluda	1	23	19	43	1	32
Spartanburg	21	206	270	497	22	335
Sumter	5	69	113	187	6	112
Union	3	31	38	72	3	45
Williamsburg	3	34	27	64	3	57
York	12	133	161	306	14	204
Total	207	3,064	3,882	7,153	226	4,950

* This chart is not comparable to any published statistics from 1987 and prior years.

DRIVERS INVOLVED IN ACCIDENTS WHERE THE PROBABLE CAUSE WAS ALCOHOL OR DRUGS
AGE AND SEX OF DRIVER
1990

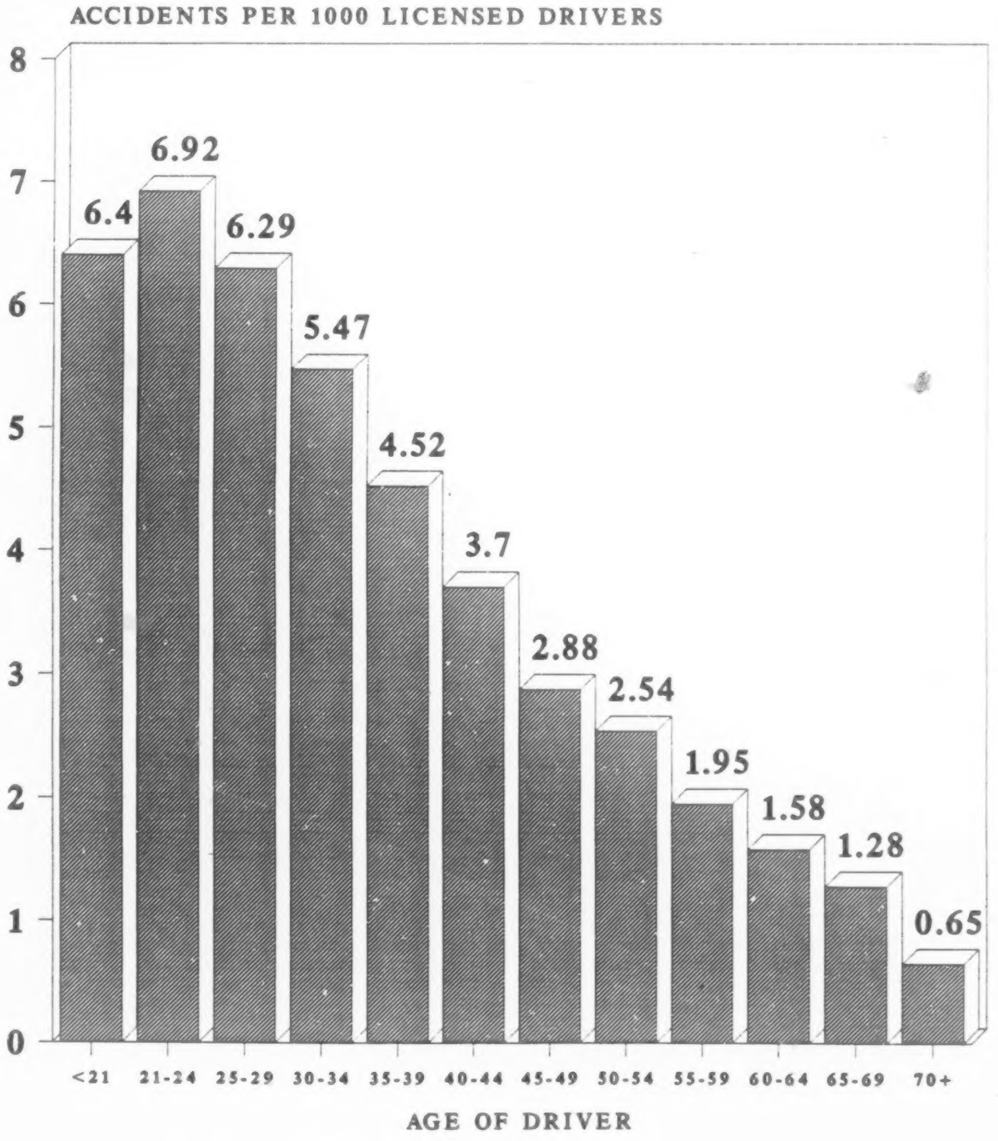
AGE	--- TOTAL ACCIDENTS ---			-- FATAL ACCIDENTS --			-- INJURY ACCIDENTS --			PROPERTY DAMAGE ACCIDENTS		
	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE
14 & younger	8	6	2	1	0	1	3	3	0	4	3	1
15	34	20	14	0	0	0	20	10	10	14	10	4
16	110	79	31	1	0	1	52	39	13	57	40	17
17	202	158	44	7	7	0	100	80	20	95	71	24
18	290	229	61	12	12	0	136	103	33	142	114	28
19	355	276	79	8	7	1	166	132	34	181	137	44
20	324	249	75	7	6	1	170	126	44	147	117	30
21	340	270	70	9	8	1	160	125	35	171	137	34
22	336	254	82	8	6	2	154	120	34	174	128	46
23	321	268	53	8	5	3	131	110	21	182	153	29
24	380	303	77	11	7	4	174	134	40	195	162	33
25 to 29	1,832	1,390	442	50	42	8	798	595	203	984	753	231
30 to 34	1,574	1,213	361	41	34	7	721	545	176	812	634	178
35 to 39	1,219	921	298	23	17	6	517	396	121	679	508	171
40 to 44	914	708	206	26	22	4	372	280	92	516	406	110
45 to 49	542	421	121	16	14	2	213	157	56	313	250	63
50 to 54	379	298	81	11	8	3	137	101	36	231	189	42
55 to 59	261	196	65	9	9	0	101	71	30	151	116	35
60 to 64	196	161	35	6	5	1	73	59	14	117	97	20
65 to 69	148	115	33	7	6	1	53	42	11	88	67	21
70 & older	111	83	28	2	2	0	50	37	13	59	44	15
Unknown age	42	38	4	0	0	0	12	9	3	30	29	1
Unknown sex[1]	737	-	-	9	-	-	173	-	-	555	-	-
TOTALS[2]	**10,655**	**7,656**	**2,262**	**272**	**217**	**46**	**4,486**	**3,274**	**1,039**	**5,897**	**4,165**	**1,177**

[1] - Includes drivers whose sex was not recorded on the report, plus hit and run accidents for which driver information was not determined; also includes parked cars with no driver.

[2] - Adding male, female and unknown sex, totals will equal the total for all drivers.

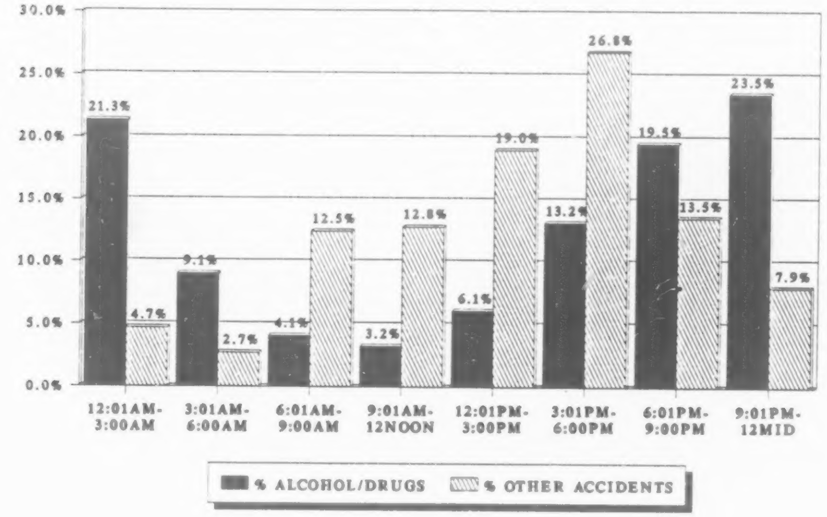
Out of the 10,655 drivers involved in accidents where the probable accident cause was alcohol or drugs and whose gender was known, 77.2% were males. A total of 1,323 (12.4% of the total) drivers were under the age of 21. In fatal accidents males comprised 82.5% of all known drivers. There were 36 drivers (13.2%) under age 21 involved in fatal accidents. Male drivers between 21 and 34 years of age accounted for 34.7% of the drivers involved in accidents with a probable cause of alcohol or drugs but comprised only 21.9% of the drivers in all accidents and 16.1% of the state's licensed drivers in 1990. Moreover, for fatal accidents with an alcohol/drug probable cause, male drivers age 21 to 34 accounted for 38.7% of the known drivers.

DRIVERS INVOLVED IN TRAFFIC ACCIDENTS
PROBABLE CAUSE: ALCOHOL OR DRUGS
1990



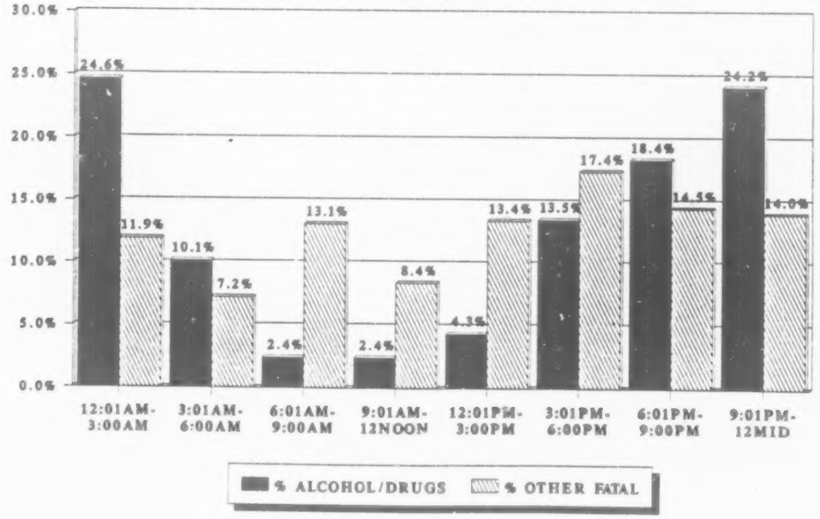
ALCOHOL/DRUG RELATED ACCIDENTS VERSUS *ALL* OTHER ACCIDENTS BY TIME OF DAY

1990

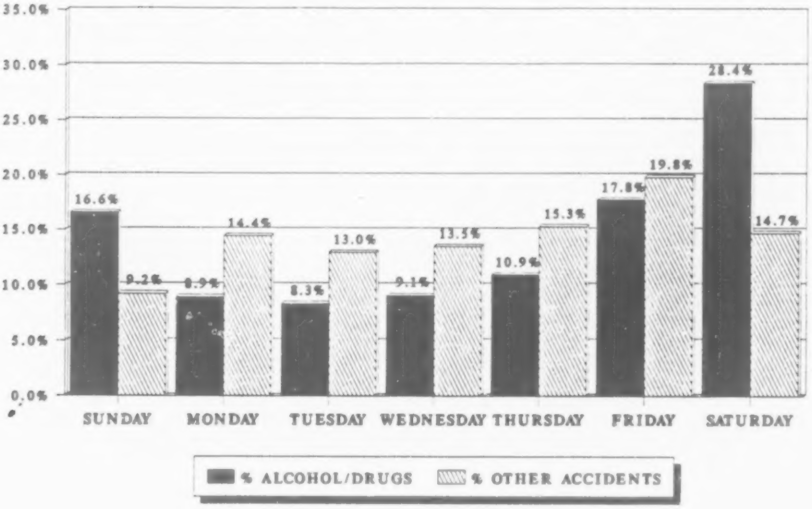


ALCOHOL/DRUG RELATED ACCIDENTS VERSUS ALL OTHER *FATAL* ACCIDENTS BY TIME OF DAY

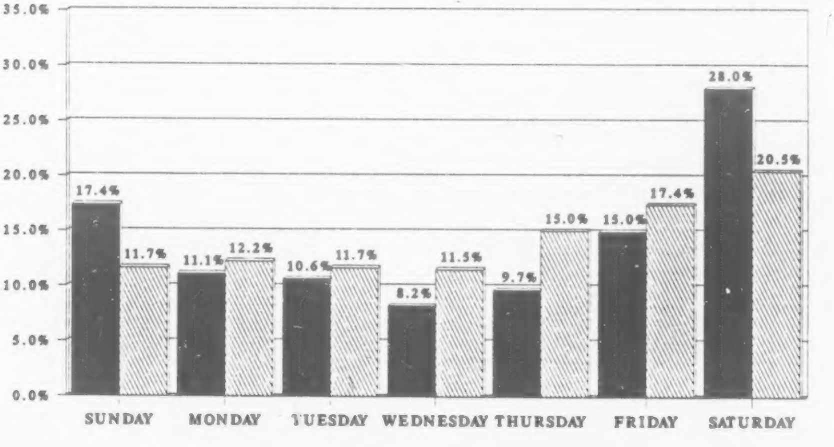
1990



ALCOHOL/DRUG RELATED ACCIDENTS VERSUS *ALL* OTHER ACCIDENTS BY DAY OF WEEK
1990



ALCOHOL/DRUG RELATED ACCIDENTS VERSUS ALL OTHER *FATAL* ACCIDENTS BY DAY OF WEEK
1990

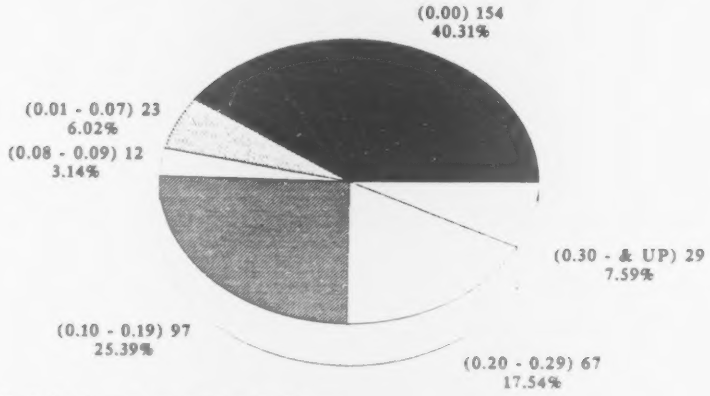


BLOOD ALCOHOL LEVELS (BAC)
DRIVERS AND PEDESTRIANS IN FATAL ACCIDENTS*
1989

	BAC LEVELS						
COUNTY	0.00	0.01–0.07	0.08–0.09	0.10–0.19	0.20–0.29	0.30 AND UP	TOTAL TESTED
Abbeville	1	1	0	1	1	0	4
Aiken	5	0	0	4	7	3	19
Allendale	0	0	0	0	1	0	1
Anderson	10	1	1	7	6	1	26
Bamberg	4	0	0	1	0	0	5
Barnwell	0	0	1	0	0	0	1
Beaufort	0	1	1	1	2	1	6
Berkeley	4	1	0	2	0	1	8
Calhoun	0	0	0	0	1	0	1
Charleston	7	1	1	5	4	4	22
Cherokee	3	1	0	1	1	0	6
Chester	0	0	0	4	1	2	7
Chesterfield	0	1	1	1	0	1	4
Clarendon	3	0	0	0	1	0	4
Colleton	2	0	0	0	1	0	3
Darlington	8	1	0	7	4	1	21
Dillon	3	0	0	0	0	2	5
Dorchester	3	0	0	2	1	1	7
Edgefield	0	0	0	0	0	0	0
Fairfield	1	0	0	0	0	0	1
Florence	4	0	0	8	0	1	13
Georgetown	4	0	1	2	0	0	7
Greenville	27	1	1	13	7	0	49
Greenwood	2	0	0	0	1	0	3
Hampton	1	0	1	2	0	0	4
Horry	6	2	2	4	1	3	18
Jasper	1	2	0	2	2	0	7
Kershaw	1	1	0	1	0	0	3
Lancaster	1	0	0	2	0	0	3
Laurens	2	1	0	0	1	2	6
Lee	4	0	0	3	0	0	7
Lexington	2	1	0	6	1	0	10
McCormick	1	0	0	0	0	0	1
Marion	2	0	0	1	2	0	5
Marlboro	7	1	0	0	1	0	9
Newberry	0	0	0	0	0	0	0
Oconee	3	0	0	0	5	0	8
Orangeburg	4	2	0	1	1	1	9
Pickens	4	0	0	2	0	0	6
Richland	8	3	2	2	1	2	18
Saluda	0	0	0	0	0	0	0
Spartanburg	12	1	0	7	7	2	29
Sumter	1	0	0	0	0	0	1
Union	0	0	0	0	1	1	2
Williamsburg	2	0	0	2	2	0	6
York	1	0	0	3	3	0	7
Total	**154**	**23**	**12**	**97**	**67**	**29**	**382**

* Includes only drivers and pedestrians 16 years of age and older who died within 4 hours of the accident. Only BAC levels for known test results are included. No test results for surviving drivers are included. 1989 is the latest year in which this data is available. The information is provided by the state's coroners, in cooperation with State Law Enforcement Division.

BLOOD ALCOHOL LEVELS*
1989



*Includes known test results for drivers and pedestrians 16 yrs. of age and older who died within 4 hrs. of the accident.

In South Carolina, it is inferred that you are under the influence when your Blood Alcohol Concentration (BAC) is at a level of 0.10 percent. At this level, you are seven times more likely to have an automobile accident than if your BAC were zero (0.00). If your BAC reaches 0.15 percent, your chances of having an accident are 25 times greater.

BAC Levels	Common Effects
0.03	Mild alteration of feelings. Level of impairment is not generally too serious.
0.05	Feelings of relaxation, sedation and/or euphoria. Increased difficulty in performing motor skills. Driving ability and judgement impaired.
0.10	Physical and mental impairment affecting perception and performance. Deterioration in motor coordination. Hearing and speech impaired. Uncoordinated behavior. Legally inferred to be under the influence in South Carolina.
0.15	Serious impairment of physical and mental functioning. Irresponsible behavior. Distorted perception and judgement. Difficulty in standing, walking, and talking.
0.40	Coma results. The person cannot be awakened.
0.60	Death can result from alcohol overdose or accidental choking. At high BAC level, absorption of alcohol continues at a constant rate while oxidation slows because the high BAC causes anesthetization of the heart and lungs. Death occurs when the respiratory and circulatory systems cease to function.

As indicated on the previous page, state law requires that each of the 46 coroners draw blood samples from all drivers and pedestrians over 16 years of age who die within four hours from injuries sustained in a traffic accident. The graph above shows the blood alcohol levels for the 382 drivers and pedestrians meeting these criteria and whose results were determined by a qualified testing lab.

DEFINITIONS*

Alcohol Related Motor Vehicle Accident - Any accident in which either a driver or a non-occupant (such as a pedestrian) had a measurable or estimated blood alcohol concentration (BAC) of .01 percent or above.

Driver - An occupant who is in actual physical control of a transport vehicle, or for an out-of-control vehicle, an occupant who was in control until control was lost.

Driver Intention - What the driver intended to do just prior to the first harmful event and before executing an evasive maneuver.

Fatal Injury - Any injury that results in death.

First Harmful Event - The first event in a traffic accident to result in injury or damage.

Harmful Event - An occurrence of injury or damage.

Incapacitating Injury - Any injury, other than a fatal injury, which prevents the injured person from walking, driving or normally continuing the activities he was capable of performing before the injury occurred.

Junction - Either an Intersection or the connection between a driveway access and a roadway other than a driveway access.

Injury - Bodily harm to a person.

Moped** - A moped is a speed-limited motor-driven cycle which may be propelled by pedaling.

Motor Vehicle - Any motorized (mechanically or electrically powered) road vehicle not operated on rails.

Motor Vehicle Accident - A transport accident that (1) involves a motor vehicle in transport, (2) is not an aircraft accident or watercraft accident and (3) does not include any harmful event involving a railway train in transport prior to involvement of a motor vehicle in transport.

Non-Incapacitating Evident Injury - Any injury, other than a fatal injury or incapacitating injury, which is evident to observers at the scene of the accident in which the injury occurred.

Nonjunction - A nonjunction is anything that is not an intersection or the connection between a driveway access and a roadway other than a driveway access.

Occupant - Any person who is part of a transport vehicle.

Pedalcyclist - Any occupant of a pedalcycle in transport.

Pedestrian - Any person who is not an occupant.

Possible Injury - Any injury which is reported or claimed which is not a fatal injury, incapacitating injury or non-incapacitating injury.

Probable Cause - The cause or factor which created the accident situation.

Rural Area - Any area which is not within urban areas.

Traffic Accident - A road vehicle accident in which (1) the unstabilized situation originates on a traffic way or (2) a harmful event occurs on a traffic way.

Traffic Unit - A traffic unit is a road vehicle or pedestrian.

Truck Tractor - A truck tractor is a motor vehicle consisting of a single motorized transport device designed primarily for drawing trailers.

Urban Area - An area whose boundaries shall be fixed by responsible state and local officials in cooperation with each other and approved by the Federal Highway Administration. Such boundaries are established in accordance with the provisions of Title 23 of the United States Code.

---

* Source: National Safety Council, Manual on Classification of Motor Vehicle Traffic Accidents, Fifth Edition.

** - A moped is defined in the South Carolina Code of Laws, Section 56-5-165 (1986). In part, this specifies that the "... motor is not to exceed fifty cubic centimeters and produce not more than one and one-half brake horsepower".

Index

- **Alcohol/Drugs, Accidents with Probable Cause of** 12,79-83
  - Age of Drivers, in 80-81
  - By County - All, Fatal and Injury Accidents 79
  - Sex of Drivers 80
- Versus Other All/Fatal by Time/Day 82-83
- Alcohol, Blood Alcohol Levels - 1989 Accidents 84-85
- Bicycle Accidents 62-63
- Child Safety Seats, Injuries to Occupants Seated in 75-76
- County, All, Injury and Fatal Accidents 38
- Day of Week, All and Fatal Accidents 27,29
- **Drivers**
  - Intentions of 22-23
  - Licensed by Age and Sex 21
  - Number Licensed in South Carolina 5,9,20
  - Out-of-State Drivers in South Carolina Accidents 24
  - Traffic Accidents by Age and Sex 21
  - Violations by, in All Accidents 19
- Drugs, Accidents with Probable Cause of ..... See Alcohol
- **Economic Loss From Motor Vehicle Accidents**
  - By County 73
  - Statewide 5,9,73
- **Fatal Accidents** 5
  - Alcohol/Drugs as the Probable Cause, by County 79
  - Bicycle 62-63
  - Age and Sex of Driver 21
  - County, Summary of 38
  - First Harmful Event in 15-17
  - By Month 28-29
  - Mopeds 60-61
  - Motorcycles 57-59
  - Pedestrians 66-67
  - Probable Cause in 12-14
  - School Bus 64-65
  - By Time of Day 26,29
  - Truck Tractors 70-71
  - Trains 68-69
- **Fatalities in Traffic Accidents** 5,9,10,74
  - By County 38
  - By First Harmful Event 15
  - By Highway District 37
  - On Selected Holidays 30-31
  - By Jurisdiction 40-45
  - By Probable Cause 12
  - (See Fatal Accidents for Fatalities in Accidents Involving Specific Unit Types)
- **First Harmful Event - All, Injury and Fatal Accidents** ...15-17
  - Definition of 86
- Highway Districts - Fatalities in 37
- Holidays - Fatal Accidents and Persons Killed 30-31
- **Injury Accidents** 5
  - Age and Sex of Driver in..... 21
  - Alcohol/Drugs as the Probable Cause, by County 79

Index

    Bicycle 62
    By County 38
First Harmful Event in 15
    Jurisdiction 40-45
    Moped 60-61
    Motorcycle 57-59
    Pedestrians 66-67
    Probable Cause in 12
    School Bus 64-65
    Trains 68-69
    Truck Tractors 70-71
Injuries 5,9,10,74
    By Age and Sex 74
    By Jurisdiction 40-45
    By County 38
    By First Harmful Event 15
    By Probable Cause 12
    By Severity 74
    (See Injury Accidents for Injuries Involving
     Specific Unit Types)
Licensed Drivers - by Age and Sex 20
Light Conditions, All and Fatal Accidents 50
Locale, All Accidents 48
Mileage Death Rate, US and SC 11
Month - All and Fatal Accidents 28
Moped Accidents 60-61
Motorcycle Accidents 57-59
Motor Vehicles
    Accidents by Type Unit 54
    Definition of 86
    Registrations by County 53
Pedestrians Involved in Traffic Accidents 66-67
Population
    All Accidents per 1,000 Population (by County) 36
    Fatal Accidents per 100,000 Population (by County) ... 36
Probable Cause, All, Injury and Fatal Accidents 12-13
Restraints, Injuries by Usage 75
Road Character, All and Fatal Accidents 51
Road Defect, All and Fatal Accidents 51
Rural Traffic Accidents, All and Fatal 35
Safety Belts (See Restraints)
School Bus Accidents 64-65
Surface Conditions, All and Fatal Accidents 49
Time of Day, All and Fatal Accidents 26
Truck Tractor Accidents 70-71
Traffic Control, All and Fatal Accidents 50
Trains, Traffic Accidents Involving 68-69
Urban Traffic Accidents, All and Fatal 35
Uniform Traffic Accident Report (Form TR-310) 6-8
Vehicle Miles of Travel 5,9,10
Violations, by Drivers Involved in Traffic Accidents 19
Weather, All and Fatal Accidents 49
Work Zones, Traffic Accidents Occurring In 47,51

Acknowledgments

The Highway Safety Office of the South Carolina Department of Highways and Public Transportation would like to take this opportunity to express sincere appreciation to all persons, agencies, departments and organizations who have contributed to this publication.

The vast majority of the data used to produce this publication was tabulated from the Uniform Traffic Accident Reports for Investigating Officers. These reports were submitted by members of the South Carolina Highway Patrol, City Police Departments, County Police Agencies, and various other Law Enforcement Agencies.

The Highway Safety Office gives special recognition to the above traffic investigative agencies, and in doing so, cannot forget the support and cooperation of the following organizations within the Department of Highways and Public Transportation: Engineering Division, Division of Motor Vehicles, Public Affairs Office and the Data Processing Office.

The Highway Safety Office, which tabulated the traffic accident data and other pertinent information for this publication, could not have done so without the untiring efforts of the above persons and organizations.

AFTER IMPACT LOCATION - INJURIES SUSTAINED*

1989

AFTER IMPACT LOCATION	INJURY TYPE NOT INJURED	POSSIBLE	NON INCAPACITATING	INCAPACITATING	KILLED	UNKNOWN INJURY	TOTALS
NOT EJECTED OR TRAPPED	260,537	29,012	9,169	5,129	379	50	304,276
TOTAL EJECTION	744	315	257	466	203	0	1,985
PARTIAL EJECTION	67	95	101	148	55	0	466
TRAPPED	123	106	111	379	154	0	873
UNKNOWN	2,404	615	103	102	5	112	3,341
TOTALS	**263,875**	**30,143**	**9,741**	**6,224**	**796**	**162**	**310,941**

INJURIES SUSTAINED BY CHILDREN UNDER SIX YEARS OF AGE - 1989**

RESTRAINT	INJURY TYPE NOT INJURED	POSSIBLE	NON INCAPACITATING	INCAPACITATING	KILLED	UNKNOWN INJURY	TOTALS
CHILD SAFETY SEAT USED	4,803	342	48	25	1	1	5,220
OTHER RESTRAINT USED	4,916	334	76	20	3	2	5,351
NO RESTRAINT USED	1,841	352	112	56	11	2	2,374
UNKNOWN RESTRAINT USAGE	198	31	4	6	1	4	244
TOTALS	**11,758**	**1,059**	**240**	**107**	**16**	**9**	**13,189**

* Occupants of automobiles, pickup trucks, truck tractors and other trucks only.

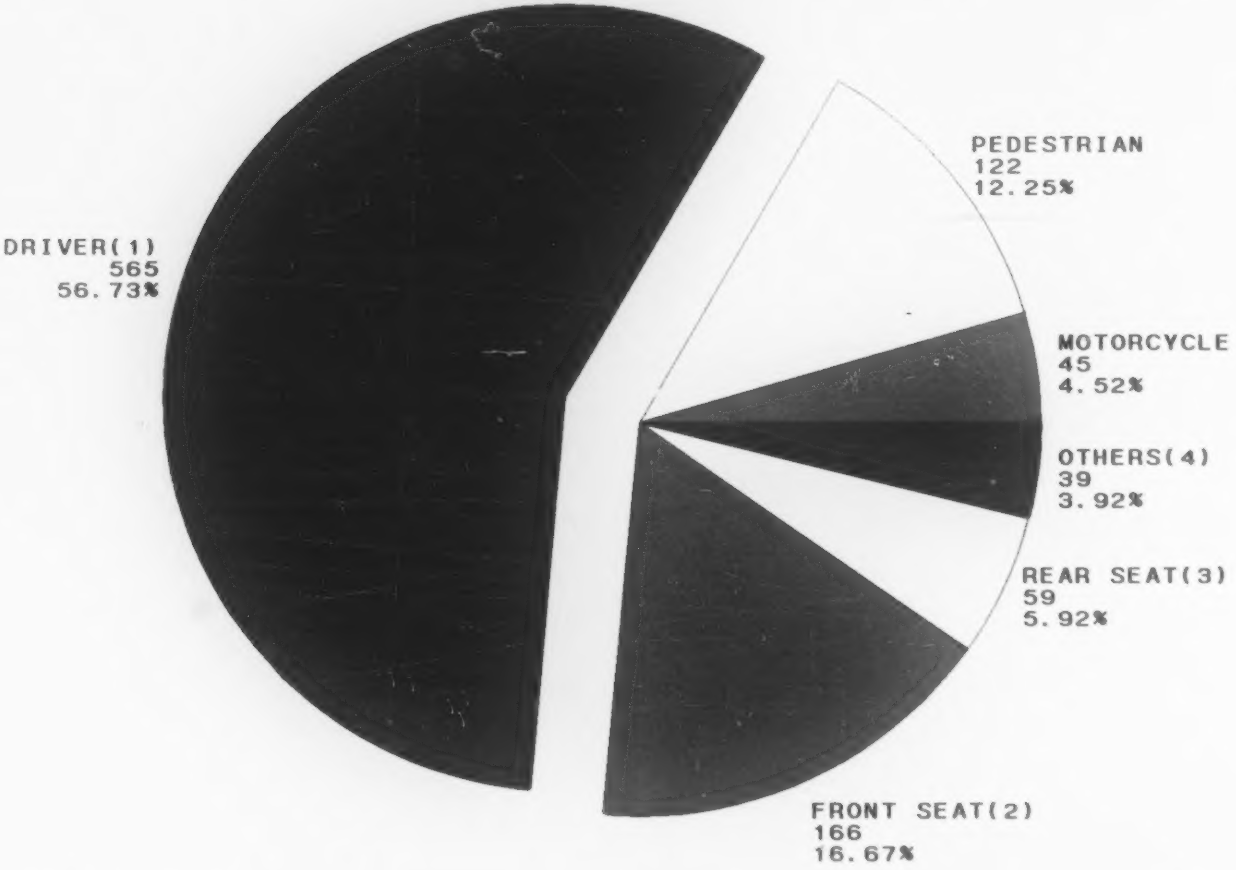
** Includes only children seated inside the vehicle.

There were a total of 310,941 occupants of automobiles and trucks involved in traffic accidents in 1989. Most of these persons (263,875) sustained no injuries. Most persons involved in accidents were not ejected from or trapped in the vehicle (304,276/97.9%). A total of 379 of the occupants not ejected or trapped suffered fatal injuries, comprising 1 out of every 803 of these occupants. Of the 1,985 occupants totally ejected, 203 or 1 in 9 were killed. For the 873 trapped occupants, 154 or about 1 in 6 were killed.

In 1989, 13,189 children under 6 years of age were involved in traffic accidents in South Carolina. This does not include children who were either pedestrians or occupants seated outside the vehicle (such as on the hood of a car). Nearly 40% were restrained by a Federally approved child safety seat. An additional 18% were restrained with a seat belt or seat belt/shoulder harness combination. These figures indicate a reported compliance rate of approximately 58%. Of those children restrained by a child safety seat, only 1 was killed. Three children restrained by a belt were killed and eleven unrestrained children died. The fatality rate for unrestrained children was 1 in every 216 children compared to 1 in every 5,220 children in safety seats and 1 in every 1,784 belted children.

FATALITIES BY SEATING LOCATION

1989



(1) INCLUDES DRIVERS OF ALL AUTOMOBILES, TRUCKS AND BUSES
(2) FRONT SEAT PASSENGERS OF AUTOS, TRUCKS AND BUSES (EXCLUDES DRIVERS)
(3) REAR SEAT PASSENGERS OF AUTOS, TRUCKS AND BUSES
(4) INCLUDES BICYCLISTS, MOPED RIDERS AND PERSONS ON THE OUTSIDE OF THE VEHICLE

PART IV
ALCOHOL & DRUGS

Alcohol-related traffic accidents are responsible for a large portion of reported traffic accidents each year. The percentage of accidents which are alcohol-related increases as the severity of injuries involved increases. On the following pages accident statistics are presented which are based on the probable accident cause as determined by the officers who investigate the traffic accidents. Accidents listed by county and driver involvement are not comparable to any statistics published prior to 1988. In previous years, alcohol and drug involvement was based on a question contained in the Uniform Traffic Accident Report for each driver, "Had been drinking or using drugs". Beginning with 1988, the alcohol and drug accidents are based on the probable cause field which lists 74 causes from which the investigating officer must choose the single probable cause in the accident. Eight of these choices concern alcohol or drug usage.

The data presented here is a summary of these eight alcohol or drug-related probable causes. This data will not include any accidents where the probable cause was something other than alcohol or drugs, even if one of the drivers was intoxicated. For example, if a drunk driver runs a stop sign and this results in a traffic accident, the officer may choose to indicate "disregarding sign or signal" as the probable cause. As a result, alcohol involvement in South Carolina traffic accidents is probably understated in this data.

Despite the restrictive nature in which this data was compiled, these figures indicate alcohol and drugs are important contributors to the frequency and severity of traffic accidents. Some of the key findings in the alcohol/drug data are as follows:

- Alcohol or drug usage was the probable cause in 168 fatal accidents in 1989, resulting in the deaths of 189 persons. Both figures are down from 1988 and represent 18.8% and 19.0% respectively of all fatal accidents and persons killed during the year. These proportions are considerably higher than the 4.1% of accidents which were caused by alcohol or drugs in property damage only accidents.

- Drivers under 21 years of age accounted for 12.6% of all drivers whose age was known in accidents with a probable cause of alcohol or drugs. This is down from 13.7% in in 1988.

- Blood alcohol data is compiled for drivers and pedestrians, who were over 16 years of age and died within 4 hours of a traffic accident. For 1988, the latest year for which complete data is available, 62.2% of all known test results on these victims indicated a positive blood alcohol content.

TRAFFIC ACCIDENTS IN SOUTH CAROLINA WITH A PROBABLE CAUSE OF ALCOHOL OR DRUGS*
1989

	TYPE ACCIDENT				PERSONS	
COUNTY	FATAL	INJURY	PDO	TOTAL	KILLED	INJURED
Abbeville	1	12	23	36	1	24
Aiken	7	96	123	226	8	155
Allendale	0	10	6	16	0	24
Anderson	12	84	100	196	12	132
Bamberg	1	11	14	26	2	26
Barnwell	2	15	20	37	2	23
Beaufort	3	47	79	129	3	76
Berkeley	5	90	119	214	6	143
Calhoun	2	13	14	29	2	23
Charleston	13	250	290	553	14	401
Cherokee	3	62	70	135	5	98
Chester	6	36	30	72	6	61
Chesterfield	2	52	30	84	2	82
Clarendon	0	24	31	55	0	32
Colleton	1	32	51	84	1	55
Darlington	4	82	71	157	6	135
Dillon	4	24	34	62	5	43
Dorchester	6	52	70	128	6	73
Edgefield	0	10	9	19	0	17
Fairfield	1	20	21	42	1	32
Florence	4	118	115	237	5	176
Georgetown	2	61	47	110	2	88
Greenville	8	238	412	658	8	375
Greenwood	1	33	48	82	1	53
Hampton	1	10	13	24	1	22
Horry	8	156	220	384	9	279
Jasper	3	13	20	36	3	18
Kershaw	0	35	59	94	0	47
Lancaster	4	53	47	104	4	89
Laurens	3	39	67	109	3	59
Lee	0	19	13	32	0	35
Lexington	7	120	173	300	9	185
McCormick	0	7	9	16	0	7
Marion	2	33	38	73	2	51
Marlboro	0	24	32	56	0	41
Newberry	2	23	39	64	2	36
Oconee	4	50	65	119	5	68
Orangeburg	5	61	83	149	6	106
Pickens	3	61	99	163	3	111
Richland	12	229	311	552	12	346
Saluda	1	12	20	33	1	21
Spartanburg	12	193	299	504	15	304
Sumter	2	60	89	151	5	104
Union	1	28	33	62	1	52
Williamsburg	2	40	25	67	2	60
York	8	134	130	272	8	201
TOTALS	**168**	**2,872**	**3,711**	**6,751**	**189**	**4,589**

* This chart is not comparable to any published statistics from 1987 and prior years.

DRIVERS INVOLVED IN ACCIDENTS WHERE THE PROBABLE CAUSE WAS ALCOHOL OR DRUGS
AGE AND SEX OF DRIVER
1989

	--- TOTAL ACCIDENTS ---			-- FATAL ACCIDENTS --			-- INJURY ACCIDENTS --			PROPERTY DAMAGE ACCIDENTS		
AGE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE
14 & younger	8	7	1	1	1	0	2	1	1	5	5	0
15	23	10	13	1	1	0	8	4	4	14	5	9
16	101	76	25	2	2	0	44	34	10	55	40	15
17	194	142	52	3	3	0	77	52	25	114	87	27
18	268	198	70	8	4	4	117	86	31	143	108	35
19	296	223	73	6	5	1	128	94	34	162	124	38
20	298	236	62	12	11	1	126	103	23	160	122	38
21	357	283	74	11	8	3	165	128	37	181	147	34
22	322	255	67	8	7	1	147	117	30	167	131	36
23	289	238	51	6	4	2	136	111	25	147	123	24
24	352	276	76	9	8	1	160	127	33	183	141	42
25 to 29	1,775	1,383	392	51	46	5	779	603	176	945	734	211
30 to 34	1,549	1,195	354	29	25	4	643	483	160	877	687	190
35 to 39	1,093	813	280	15	13	2	491	370	121	587	430	157
40 to 44	824	629	195	15	12	3	352	260	92	457	357	100
45 to 49	565	418	147	11	9	2	232	170	62	322	239	83
50 to 54	389	305	84	15	12	3	146	118	28	228	175	53
55 to 59	254	193	61	2	2	0	111	84	27	141	107	34
60 to 64	218	178	40	5	4	1	89	74	15	124	100	24
65 to 69	152	120	32	5	5	0	59	50	9	88	65	23
70 & older	137	101	36	3	2	1	64	48	16	70	51	19
Unknown age	62	54	8	0	0	0	21	18	3	41	36	5
Unknown sex[1]	769	-	-	11	-	-	167	-	-	529	-	-
TOTALS[2]	**10,295**	**7,333**	**2,193**	**229**	**184**	**34**	**4,264**	**3,135**	**962**	**5,740**	**4,014**	**1,197**

[1] - Includes drivers whose sex was not recorded on the report, plus hit and run accidents for which driver information was not determined; also includes parked cars with no driver.

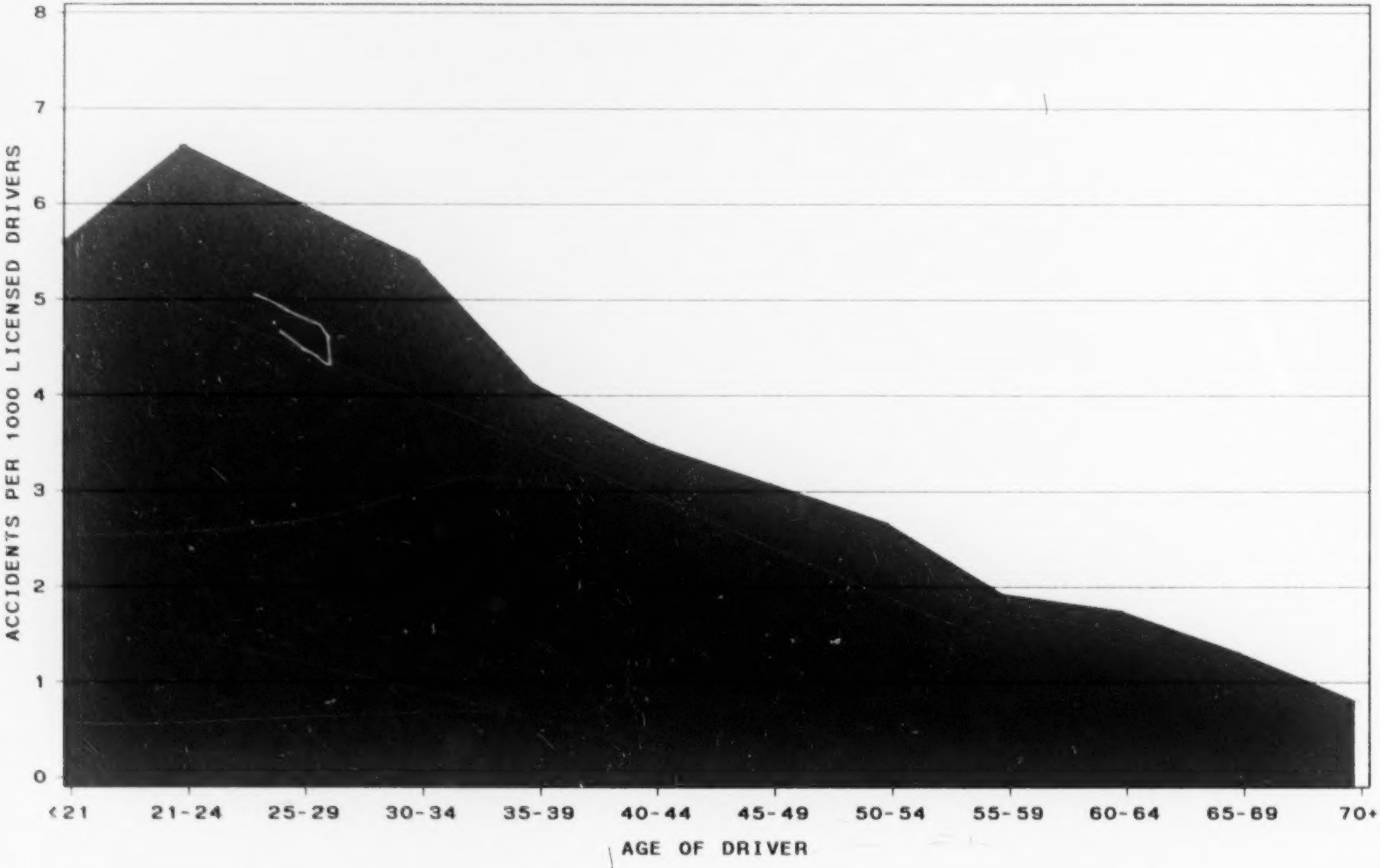
[2] - Adding male, female and unknown sex, totals will equal the total for all drivers.

Out of the 10,295 drivers involved in accidents where the probable accident cause was alcohol or drugs and whose gender was known, 77% were males. A total of 1,188 (12.5% of the total) drivers were under the age of 21. In these fatal accidents males comprised 84.4% of all known drivers. There were 33 (15.1%) drivers under age 21 involved in fatal alcohol/drug-related accidents. Male drivers between 21 and 34 years of age accounted for 38.1% of the drivers involved in accidents with a probable cause of alcohol or drugs but comprised only 23.8% of the drivers in all accidents and 16.4% of the state's licensed drivers in 1989. Moreover, for fatal accidents with an alcohol/drug probable cause, male drivers age 21 to 34 accounted for 52.2% of the known drivers.

DRIVERS INVOLVED IN TRAFFIC ACCIDENTS

PROBABLE CAUSE: ALCOHOL OR DRUGS

1989



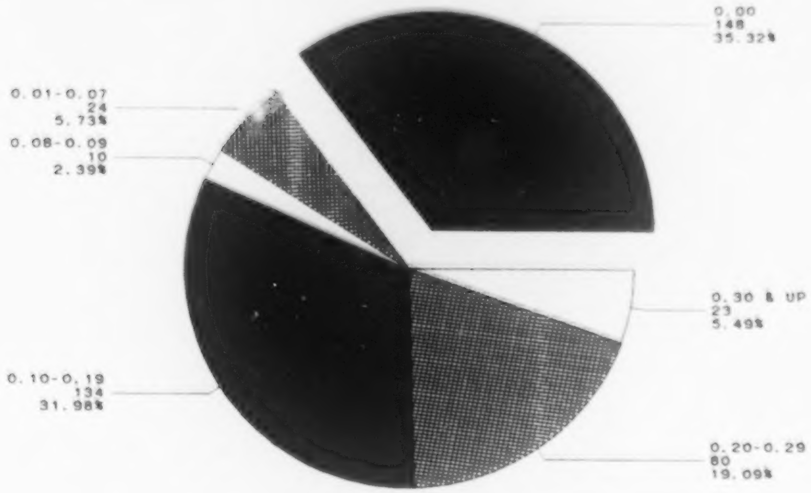
BLOOD ALCOHOL LEVELS (BAC)
DRIVERS AND PEDESTRIANS IN FATAL ACCIDENTS*
1988

	BAC LEVELS						
COUNTY	0.00	0.01- 0.07	0.08- 0.09	0.10- 0.19	0.20- 0.29	0.30 AND UP	TOTAL TESTED
Abbeville	0	0	0	0	1	0	1
Aiken	3	0	0	6	4	0	13
Allendale	1	0	0	0	0	0	1
Anderson	2	0	0	8	4	1	15
Bamberg	0	0	0	3	0	0	3
Barnwell	1	1	0	0	1	0	3
Beaufort	1	1	1	4	1	0	8
Berkeley	5	1	1	6	4	3	20
Calhoun	0	0	0	1	0	0	1
Charleston	8	1	1	6	6	4	26
Cherokee	1	1	0	0	1	0	3
Chester	0	0	0	2	1	0	3
Chesterfield	1	0	0	1	1	1	4
Clarendon	1	0	0	0	0	0	1
Colleton	3	0	0	1	4	0	8
Darlington	4	1	0	4	1	2	12
Dillon	1	0	0	0	0	0	1
Dorchester	4	0	0	1	2	0	7
Edgefield	0	0	0	0	0	0	0
Fairfield	3	0	0	4	3	0	10
Florence	11	0	0	6	1	0	18
Georgetown	5	0	0	5	2	1	13
Greenville	22	5	0	11	7	3	48
Greenwood	1	0	0	2	1	0	4
Hampton	0	0	0	2	0	0	2
Horry	12	2	0	7	1	2	24
Jasper	0	0	0	1	0	0	1
Kershaw	2	0	0	1	1	0	4
Lancaster	5	0	0	3	3	0	11
Laurens	6	0	0	1	0	1	8
Lee	3	1	0	1	0	1	6
Lexington	6	1	2	5	0	0	14
McCormick	0	0	0	0	0	0	0
Marion	4	1	0	2	1	0	8
Marlboro	1	0	1	4	3	0	9
Newberry	1	0	0	0	1	0	2
Oconee	6	0	0	1	0	0	7
Orangeburg	0	2	0	2	3	0	7
Pickens	1	0	0	1	3	0	5
Richland	7	1	3	7	7	2	27
Saluda	0	0	0	3	1	0	4
Spartanburg	13	1	0	12	8	2	36
Sumter	1	2	0	2	1	0	6
Union	0	0	0	1	1	0	2
Williamsburg	0	1	1	1	0	0	3
York	2	1	0	6	1	0	10
TOTALS	**148**	**24**	**10**	**134**	**80**	**23**	**419**

* Includes only drivers and pedestrians 16 years of age and older who died within 4 hours of the accident. Only BAC levels for known test results are included. No test results for surviving drivers are included. 1988 is the latest year in which this data is available. The information is provided by the state's coroners, in cooperation with the State Law Enforcement Division.

BLOOD ALCOHOL LEVELS*

1988



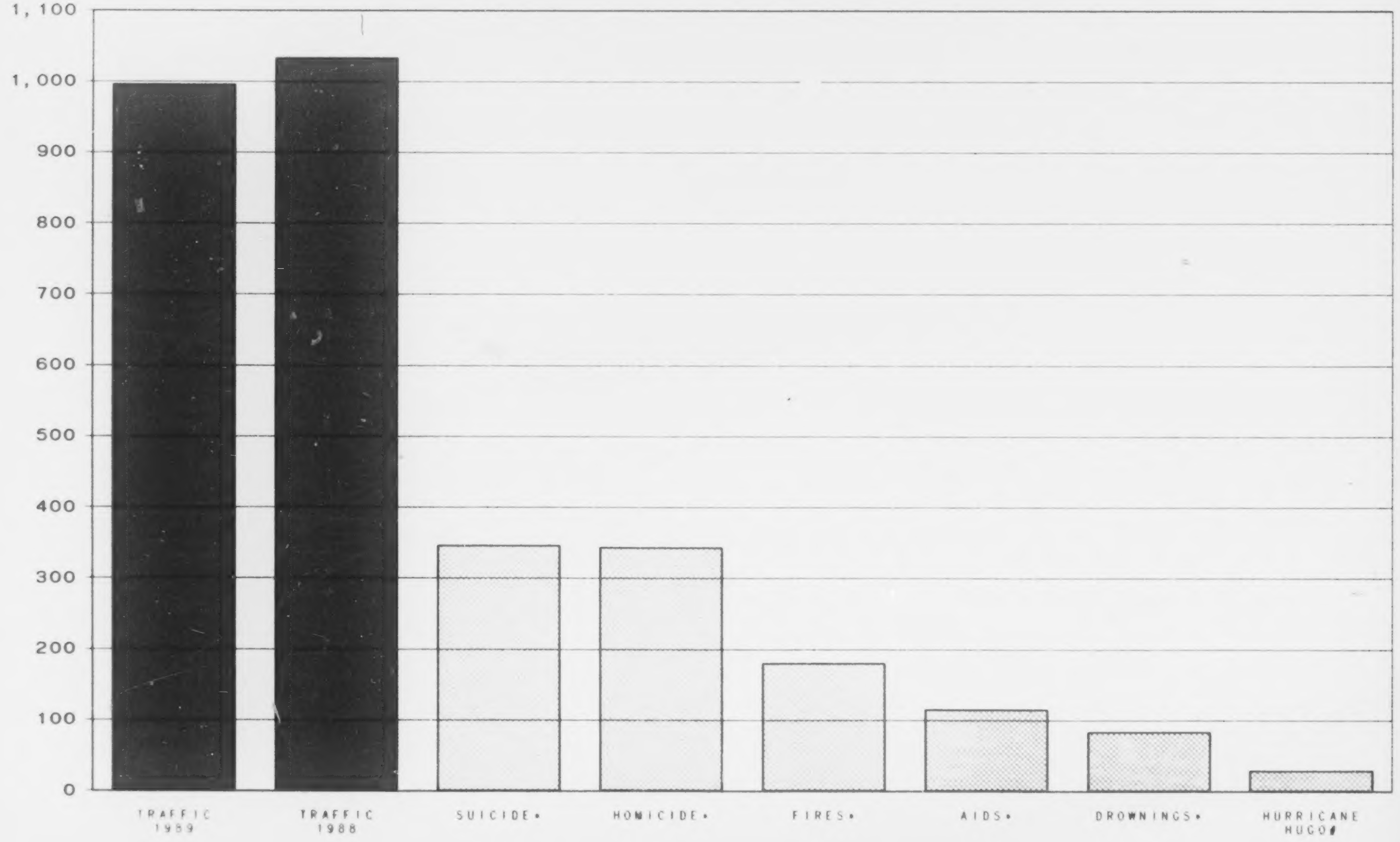
* Includes known test results for drivers and pedestrians 16 years of age and older who died within 4 hours of the accident.

In South Carolina you are presumed to be under the influence when your Blood Alcohol Concentration (BAC) is at a level of 0.10 percent. At this level you are seven times more likely to have an automobile accident than if your BAC were zero (0.00). If your BAC reaches 0.15 percent, your chances of having an accident are 25 times greater.

BAC Levels	Common Effects
0.03	Mild alteration of feelings. Level of impairment is not generally too serious.
0.05	Feelings of relaxation, sedation and/or euphoria. Increase in reaction time. Increased difficulty in performing motor skills. Driving ability and judgment impaired.
0.10	Physical and mental impairment affecting perception and performance. Deterioration in motor coordination. Hearing and speech impaired. Uncoordinated behavior. Legally presumed to be under the influence in South Carolina.
0.15	Serious impairment of physical and mental functioning.Irresponsible behavior. Distorted perception and judgment. Difficulty in standing, walking, and talking.
0.40	Coma results. The person cannot be awakened.
0.60	Death can result from alcohol overdose or accidental choking. At high BAC level, absorption of alcohol continues at a constant rate while oxidation slows because the high BAC causes anesthetization of the heart and lungs. Death occurs when the respiratory and circulatory systems cease to function.

As indicated on the previous page, state law requires that each of the 46 coroners draw blood samples from all drivers and pedestrians over 16 years of age and who die within four hours from injuries sustained in a traffic accident. The graph above shows the blood alcohol levels for the 419 drivers and pedestrians meeting these criteria and whose results were determined by a qualified testing lab.

SOUTH CAROLINA TRAFFIC DEATHS COMPARED TO DEATHS FROM SELECTED OTHER CAUSES



* Source: SC Dept. of Health and Environmental Control (1988 Figures).
# Based on Media Reports.

Definitions*

Alcohol Related Motor Vehicle Accident - Any accident in which either a driver or a non-occupant (such as a pedestrian) had a measurable estimated blood alcohol concentration (BAC) of .01 percent or above.

Driver - An occupant who is in actual physical control of a transport vehicle, or for an out-of-control vehicle, an occupant who was in control until control was lost.

Driver Intention - What the driver intended to do just prior to the first harmful event and before executing and evasive maneuver.

Fatal Injury - Any injury that results in death.

First Harmful Event - The first event in a traffic accident to result in injury or damage.

Harmful Event - An occurrence of injury or damage.

Incapacitating Injury - Any injury, other than a fatal injury, which prevents the injured person from walking, driving or normally continuing the activities he was capable of performing before the injury occurred.

Junction - Either an Intersection or the connection between a driveway access and a roadway other than a driveway access.

Injury - Bodily harm to a person.

Moped** - A moped is a speed-limited motor-driven cycle which may propelled by pedaling.

Motor Vehicle Accident - A transport accident that (1) involves a motor vehicle in transport, (2) is not an aircraft accident or watercraft accident and (3) does not include any harmful event involving a railway train in transport prior to involvement of a motor vehicle in transport.

Non-Incapacitating Evident Injury - Any injury, other than a fatal injury or incapacitating injury, which is evident to observers at the scene of the accident in which the injury occurred.

Nonjunction - A nonjunction is anything that is not an intersection or the connection between a driveway access.

Occupant - Any person who is part of a transport vehicle.

Pedalcyclist - Any occupant of a pedalcycle in transport.

Pedestrian - Any person who is not an occupant.

Possible Injury - Any injury which is reported or claimed which is not a fatal injury, incapacitating injury or non-incapacitating injury.

Probable Cause - The cause or factor which created the accident situation.

Rural Area - Any area which is not within urban areas.

Traffic Accident - A road vehicle accident in which (1) the unstabilized situation originates on a traffic way or (2) a harmful event occurs on a traffic way.

Traffic Unit - A traffic unit is a road vehicle or pedestrian.

Truck Tractor - A truck tractor is a motor vehicle consisting of a single motorized transport device designed primarily for drawing trailers.

Urban Area - An area whose boundaries shall be fixed responsible state and local officials in cooperation with each other and approved by the Federal Highway Administration. Such boundaries are established provisions of Title 23 of the United States Code.

* Source: National Safety Council, Manual on Classification of Motor Vehicle Traffic Accidents, Fifth Edition.

** - A moped is defined in the South Carolina Code of Laws, Section 56-5-165 (1986). In part, this specifies that the "...motor is not to exceed fifty cubic centimeters and produce not more than one and one-half brake horsepower".

Index

- Alcohol/Drugs, Accidents with Probable Cause 12, 64-66
  - Age of Drivers, in 66
  - By County - All, Fatal and Injury Accidents 65
  - Sex of Drivers 66
- Alcohol, Blood Alcohol Levels - 1988 Accidents 68-69
- Bicycle Accidents 52
- Child Safety Seats, Injuries to Occupants Seated in 61, 62
- County, All, Injury and Fatal Accidents 34
- Day of Week, All and Fatal Accidents 24
- Drivers
  - Intentions of 20
  - Licensed by Age and Sex 18
  - Number Licensed in South Carolina 5, 9, 18
  - Out of-State Drivers in South Carolina Accidents 21
  - Traffic Accidents by Age and Sex 19
  - Violations by, in All Accidents 17
- Drugs, Accidents with Probable Cause of ..... See Alcohol
- Economic Loss From Motor Vehicle Accidents
  - By County 59
  - Statewide 5, 9, 59
- Fatal Accidents 5
  - Alcohol/Drugs as the Probable Cause, by County 65
  - Bicycle 52
  - Age and Sex of Driver 19
  - County, Summary of 34
  - First Harmful Event in 14, 15
  - By Month 25
  - Mopeds 51
  - Motorcycles 48, 49, 50
  - Pedestrians 54
  - Probable Cause in 12, 13
  - School Bus 53
  - By Time of Day 23
  - Truck Tractors 57
  - Trains 56
- Fatalities in Traffic Accidents 5, 9, 10, 60
  - By County 34
  - By First Harmful Event 14
  - By Highway District 33
  - On Selected Holidays 26, 27
  - By Jurisdiction 36,37
  - By Probable Cause 12
  - (See Fatal Accidents for Fatalities in Accidents Involving Specific Unit Types)
- First Harmful Event - All, Injury and Fatal Accidents 14, 15
  - Definition of 71
- Highway Districts - Fatalities in 33
- Holidays - Fatal Accidents and Person Killed 26-27
- Injury accidents 5
  - Age and Sex of Driver in 19
  - Alcohol/Drugs as the Probable Cause, by County 65
  - Bicycle 52
  - By County 34
- First Harmful Event in 14
  - Jurisdiction 36-37
  - Moped 51
  - Motorcycle 48-50
  - Pedestrians 55
  - Probable Cause in 12
  - School Bus 53
  - Trains 56
- Injuries 5, 9, 10, 60
  - By Age and Sex 60
  - By Jurisdiction 36-37
  - By County 34
  - By First Harmful Event 14
  - By Probable Cause 12
  - By Severity 60
  - (See Injury Accidents for Injuries Involving Specific Unit Types)
- Licensed Drivers - by Age and Sex 18
- Light Conditions, All and Fatal Accidents 42
- Locale, All Accidents 40
- Mileage Death Rate, US and SC 11
- Month - All and Fatal Accidents 25
- Moped Accidents 51
- Motorcycle Accidents 48-50
- Motor Vehicles
  - Accidents by Type Unit 46
  - Definition of 71
  - Registrations by County 45
- Pedestrians Involved in Traffic Accidents 54-55
- Population
  - All Accidents per 1,00 Population by County) 32
- Fatal Accidents per 100,000 Population (by County) 32
- Probable Cause, All, Injury and Fatal Accidents 12, 13
- Restraints, Injuries by Usage 61
- Road Character, All and Fatal Accidents 43
- Road Defect, All and Fatal Accidents 43
- Rural Traffic Accidents, All and Fatal 31
- Safety Belts (See Restraints)
- School Bus Accidents 53
- Surface Conditions, All and Fatal Accidents 41
- Time of Day, All and Fatal Accidents 23
- Truck Tractor Accidents 57
- Traffic Control, All and Fatal Accidents 42
- Trains, Traffic Accidents Involving 56
- Urban Traffic Accidents, All and Fatal 31
- Uniform Traffic Accident Report (Form TR-310) 6-8
- Vehicle Miles of Travel 5, 9, 10
- Violation, by Drivers Involved in Traffic Accidents 17
- Weather, All and Fatal Accident 41
- Work Zones, Traffic Accidents Occurring In 39, 43

Acknowledgments

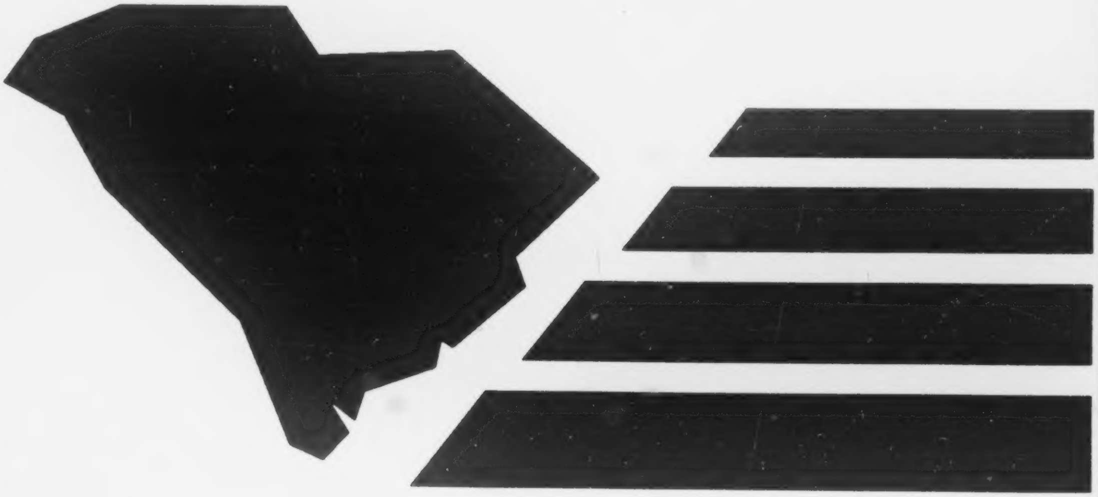
The Highway Safety Office of the Department would like to take this opportunity to express sincere appreciation to all persons, agencies, departments and organizations who have contributed to this publication.

The raw data from which this publication was produced was generated from Uniform Traffic Accident Reports for Investigating Officers which were submitted by members of the S.C. Highway Patrol, city police departments, county police agencies and other law enforcement agencies. This office gives special recognition to the above traffic investigative agencies and in doing so cannot forget the support and cooperation of the following organizations within the Department of Highways and Public Transportation: Engineering Division, Motor Vehicle Division, Public Affairs Office, Map Drafting Unit of Planning Division, Data Processing Office and the Traffic Accident Research Section.

The Traffic Records System which produced the traffic collision and other pertinent data for this publication could not have done so without the untiring efforts of the above persons and organizations.

SAFETY EDUCATION SERVICE
HSO
HIGHWAY SAFETY OFFICE
SC DEPARTMENT OF HIGHWAYS & PUBLIC TRANSPORTATION

57190-2-u



1990
SOUTH CAROLINA TRAFFIC ACCIDENT FACT BOOK

SOUTH CAROLINA
DEPARTMENT OF HIGHWAYS AND PUBLIC TRANSPORTATION
P.O. BOX 191
COLUMBIA, S.C. 29202

My fellow South Carolinians:

In 1990, South Carolina recorded the lowest highway death rate in history -- 2.9 per 100 million miles of travel as compared with 3.0 in 1989.

Our state continued a trend of reductions in deaths and injuries, because of our "Highways or Dieways?" highway safety campaign, increased enforcement by the S.C. Highway Patrol and local police agencies, engineering for better roads, and the efforts of highway safety professionals and various safety organizations. The number of traffic deaths in 1990 decreased by 1.3 percent from 1989, and the number of injuries decreased by 3.1 percent.

Of course, the real credit for these improved records belongs to the motoring public who are becoming increasingly aware of the need to drive responsibly and safely. We are happy to note increasing safety belt usage, as one indication of this awareness.

Our statistics are still too high. Traffic accidents contribute a terrible waste in human and economic resources.

But we continue to be on course through increased public education, engineering, and more and better traffic enforcement.

Please accept the appreciation of this agency for every effort to continue this positive direction, and stick with us in our war against the carnage on our highways.

Robert N. McLellan

Robert N. McLellan
Executive Director

AN EQUAL OPPORTUNITY/AFFIRMATIVE ACTION EMPLOYER

Table of Contents

Part I - GENERAL INFORMATION 4

Quick Facts 5
Uniform Traffic Accident Report 6-8
South Carolina Ten Year Traffic Trends 9
South Carolina Traffic Accidents, Deaths, etc.................... 10
SC vs. US Traffic Fatality Rates 11
Traffic Accidents by Probable Cause 12-14
Traffic Accidents by First Harmful Event 15-17

Part II - ACCIDENT CHARACTERISTICS 18

A. The Driver 19
South Carolina Drivers Licensed by Age and Sex 20
Age and Sex of Drivers Involved In Traffic Accidents 21
Driver Intentions in All Traffic Accidents 22-23
Out of State Drivers Involved In SC Traffic Accidents .. 24

B. Time 25
Traffic Accidents by Time of Day 26
Traffic Accidents by Day of the Week 27
Traffic Accidents by Month 28
Time Narratives 29
Holiday Traffic Fatalities 30-31
Motor Vehicle Traffic Death Calendar 32-33

C. Location 34
Traffic Accidents Rural/Urban 35
All and Fatal Traffic Accident Population Rates 36
Traffic Deaths by Highway District 37
Traffic Accidents by County 38
Traffic Accidents by Route Category 39
Traffic Accidents by Jurisdiction 40-45
Traffic Accidents by Harmful Event Location 46
Traffic Accidents in Construction Work Zones 47

D. Environment 48
Traffic Accidents by Road Surface Conditions 49

Table of Contents

Traffic Accidents by Weather Conditions 49
Traffic Accidents by Light Conditions 50
Traffic Accidents by Traffic Control Device 50
Traffic Accidents by Road Character 51
Traffic Accidents by Road Defect 51

E. Vehicles 52
Motor Vehicle Registrations by County 53
Unit Types in Traffic Accidents 54
Vehicle Maneuver in All Traffic Accidents 55-56
Traffic Accidents Involving Motorcycles 57-59
Traffic Accidents Involving Mopeds 60-61
Traffic Accidents Involving Bicycles 62-63
Traffic Accidents Involving School Buses 64-65
Traffic Accidents Involving Pedestrians 66-67
Traffic Accidents Involving Railway Trains 68-69
Traffic Accidents Involving Truck Tractors 70-71

Part III - ACCIDENT CONSEQUENCES 72

Economic Loss by County 73
Traffic Accident Injury Profile 74
Traffic Injuries by Restraint Usage 75
After Impact Location - Injuries Sustained 76
Injuries Sustained by Children Under Six Years of Age .. 76
Injuries Sustained by Seating Location 77

Part IV - ALCOHOL & DRUGS IN TRAFFIC ACCIDENTS 78

Alcohol/Drug Accidents by County (Probable Cause) 79
Alcohol/Drug Accidents - Age & Sex of Drivers 80-81
Alcohol/Drug Accidents by Time/Day of Week 82-83
Blood Alcohol Testing in 1989 Fatal Accidents 84-85

Definitions 86

Index 87-88

Acknowledgments 89

PART I
GENERAL INFORMATION

The number of reported traffic accidents in South Carolina declined in 1990 from 1989 by 1.4%. This was the third year in a row traffic deaths declined in South Carolina. Also, motor vehicle travel in South Carolina was up by 4.9% in 1990 over 1989. While the reduction in traffic accidents is certainly a positive sign, the 118,989 reported to the Highway Department represents the third highest total on record. Averaged over the entire year, a traffic accident was reported every 4 minutes and 25 seconds in 1990.

The number of traffic fatalities declined from 996 in 1989 to a total of 983 in 1990, a 1.3% reduction. This is the third year in a row traffic deaths declined from the previous year. The mileage Death Rate (MDR) of 2.9 deaths per hundred million vehicle miles of travel was the lowest in the state's motor vehicle history. Still, the MDR is still more than 38% above the national average of 2.1. One person was killed in a traffic accident in the Palmetto State approximately every 8 hours and 54 minutes in 1990.

The 983 traffic fatalities equal approximately one traffic fatality for every 3,547 Palmetto state residents. In SC, 335 persons under age 25 died in traffic accidents. This represents 34.1% of all traffic fatalities.

Traffic fatalities are the most sever consequence of motor vehicle accidents, but even in non- fatal accidents, the cost in human suffering can be severe. There were 48,338 traffic injuries in 1990. This total is down by 3.1% from 1989. Incapacitating injuries were down more than 6.5% from 1989.

Traffic accidents are responsible for hundreds of millions of dollars in economic losses to South Carolinians each year. Economic losses as estimated here include property damage, medical costs, and lost productivity but do not include intangible costs such as grief and suffering. In 1990, $933 million dollars in estimated losses were incurred; this figure represents a reduction of 3.3% from the previous year.

There are many causes for traffic accidents and these causes vary according to severity of the accident. For example, in 1990, accidents involving fatalities were more than 5 times as likely to have alcohol or drugs indicated as the probable cause than were accidents involving only property damage. In 1990, accidents involving collisions with a fixed object were nearly 4 times as likely to result in fatalities as were accidents involving a collision between two or more motor vehicles in transport.

What is responsible for the tragedy of motor vehicle accidents and what strategies can be employed by concerned individuals in the reduction of accidents in the future? On the following pages, statistics are presented which describe the characteristics, causes, and effects of traffic accidents in South Carolina. It is hoped that this information will be useful to all persons interested in fostering a safer operating environment for motorists in South Carolina.

1990
QUICK FACTS

STATISTIC	NUMBER	% CHANGE FROM 1989
Fatal Accidents	885	-0.9
Injury Accidents	29,776	-3.8
Property Damage Accidents	88,328	-3.4
Total Accidents	118,989	-3.5
Fatalities	983	-1.3
Non-Fatal Injuries	48,337	-3.1
Truck Tractor Fatalities	114	+17.5
Motorcycle Fatalities	50	+11.1
Bicycle Fatalities	28	+86.7
Pedestrian Fatalities	106	-13.1
Railway Train Fatalities	10	-33.3
Moped Fatalities	5	-28.6
School Bus Fatalities	4	+100.0
Economic Loss	$933,000,000	-3.3
Vehicle Miles Traveled	34,377,000,000	+4.9
Roadway Miles Maintained	64,046	-0.1
Motor Vehicle Registrations	2,576,980	+2.0
Licensed Drivers	2,383,792	+1.4
Mileage Death Rate	2.9	-3.3

DHPT USE ONLY

ORIGINAL

SOUTH CAROLINA
UNIFORM TRAFFIC ACCIDENT REPORT
(FOR INVESTIGATING OFFICERS)
D.H.P.T. FORM TR-310 Rev. 5/90

☐ Amended - Attach Copy of Original Report

☐ Corrected

# of Units

Page of Pages

2 Date	Time	County	1 - Interstate 2 - US Primary 3 - SC Primary	4 - Secondary 5 - County 6 - Other	ACCIDENT LOCATION Route Number and Name if any ON	AUXILIARY 0 - Main Line 5 - Spur 8 - Bypass 2 - Alternate 6 - Connection 9 - Other 7 - Business
3 Lane	Ramp 1 - Entrance 2 - Exit	Lane / Ramp Travel Direction N E S W	1 - Interstate 2 - US Primary 3 - SC Primary	4 - Secondary 5 - County 6 - Other	BASE INTERSECTION Route Number and Name if any FROM	AUXILIARY 0 - Main Line 5 - Spur 8 - Bypass 2 - Alternate 6 - Connection 9 - Other 7 - Business
Distance Offset MILES FEET	Direction N E S W		1 - Interstate 2 - US Primary 3 - SC Primary	4 - Secondary 5 - County 6 - Other	SECOND INTERSECTION Route Number and Name if any TOWARD	AUXILIARY 0 - Main Line 5 - Spur 8 - Bypass 2 - Alternate 6 - Connection 9 - Other 7 - Business
4 RR Crossing ID	Time Police Notified	Time Police Arrived	Time Ambulance Arrived	City or Town IN	Or if Outside Miles N E S W	For DHPT Use Only MP Grid

Unit # Sex Race	Driver or Pedestrian Full Name	Unit # Sex Race	Driver or Pedestrian Full Name
5 Birth Date	Street or R.F.D.	Birth Date	Street or R.F.D.
Residence County	City, State & Zip	Residence County	City, State & Zip
6 State Class	Driver License Number	State Class	Driver License Number
Year Body	Make & Vehicle Identification Number	Year Body	Make & Vehicle Identification Number
7 State Year	License Plate Number	State Year	License Plate Number
Home Telephone #	Owner's Full Name	Home Telephone #	Owner's Full Name
Bus. Telephone #	Street or R.F.D.	Bus. Telephone #	Street or R.F.D.
8 Residence County	City, State & Zip	Residence County	City, State & Zip
Contrib. to Acc. Yes No	Estimated Speed · Speed Limit · Hazardous Material	Contrib. to Acc. Yes No	Estimated Speed · Speed Limit · Hazardous Material
9 # of Occupants	Vehicle Towed by · Trl. Length · Trl. Width · Trl. Length · Trl. Width	# of Occupants	Vehicle Towed by · Trl. Length · Trl. Width · Trl. Length · Trl. Width
Summons Number · Violation Codes	**B-** 978551	Summons Number · Violation Codes	**B-** 978552

10 Direction of Travel

Unit #1 N E S W

Unit #2 N E S W

NORTH

11

Describe What Happened (Refer to Units by Number):

NOTICE – THE UNIFORM TRAFFIC ACCIDENT REPORT IS FOR STATISTICAL REPORTING PURPOSES ONLY AND REFLECTS THE OFFICER'S BEST KNOWLEDGE, OPINION, AND BELIEF COVERING THE ACCIDENT BUT NO WARRANT IS MADE AS TO THE FACTUAL ACCURACY THEREOF.

SPECIAL USE ONLY

Damage to Property Other Than Vehicle: $

Estimated Amt. of Damage to Unit 1: $

Estimated Amt. of Damage to Unit 2: $

Witness Full Name	Address	Phone	Zip	Age	Sex
Property Owner Name	Address	Zip			

OCCUPANTS

Name	Address	Zip
Name	Address	Zip
Name	Address	Zip
Name	Address	Zip
Name	Address	Zip
Name	Address	Zip

Investigator's Name	Rank	Badge #	Agency Type	Code	Date	Reviewer's Name	Rank

1 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 32 33 34 35

SOUTH CAROLINA UNIFORM TRAFFIC ACCIDENT REPORT D.H.P.T. FORM TR-310 Rev. 5-90

SOUTH CAROLINA
UNIFORM TRAFFIC ACCIDENT REPORT

MAIL ORIGINAL REPORT TO:

S.C. DEPT. OF HIGHWAYS
& PUBLIC TRANSPORTATION
HIGHWAY SAFETY OFFICE
POST OFFICE BOX 191
COLUMBIA, SC 29202

1
LIGHT
1 - DAYLIGHT
2 - DAWN
3 - DUSK
4 - DARK (LIGHTING UNSPECIFIED)
5 - DARK (STREET LAMPS LIT)
6 - DARK (STREET LAMPS NOT LIT)
7 - DARK (NO LIGHTS)

2
WEATHER
1 - FOG, SMOG
2 - HAIL
3 - HIGH WIND
5 - CLEAR
6 - CLOUDY
7 - RAIN
8 - SNOW, SLEET
9 - OTHER

3
LOCALE
1 - OPEN COUNTRY
2 - RESIDENTIAL
3 - SHOPPING OR BUSINESS
4 - MFG. OR INDUSTRIAL
5 - SCHOOL OR PLAYGROUND
6 - HOSPITAL

4
CHARACTER
1 - STRAIGHT - LEVEL
2 - STRAIGHT - ON GRADE
3 - STRAIGHT - HILLCREST
4 - CURVE - LEVEL
5 - CURVE - ON GRADE
6 - CURVE - HILLCREST

5
CONDITION
1 - DRY
2 - WET
3 - ICY
4 - SLUSHY
5 - SNOWY
6 - MUDDY
7 - DEBRIS
8 - OTHER

6
ROAD DEFECT
0 - NONE
1 - SHOULDER DEFECT
2 - SOFT SHOULDER
3 - LOW SHOULDER
4 - HIGH SHOULDER
5 - RUTS, HOLES, BUMPS
6 - WORN POLISHED TRAVEL SURFACE
7 - ROAD UNDER CONSTRUCTION/MAINTENANCE
8 - OTHER

7
TRAFFIC CONTROL
1 - STOP SIGN
2 - STOP AND GO SIGNAL
3 - YIELD SIGN
4 - OFFICER OR FLAGMAN
5 - RR CROSSING GATES/LIGHTS
6 - RR FLASHING LIGHTS
7 - NONE
8 - OTHER REGULATORY SIGN
9 - RR CROSSBUCKS ONLY

8
TRAFFIC CONTROL FUNCTIONING
0 - NOT APPLICABLE
1 - YES
2 - NO
3 - UNKNOWN

9
FIRST HARMFUL EVENT
SEE FIRST HARMFUL EVENT CODE LIST
ON REVERSE SIDE

10
HARMFUL EVENT LOCATION
SEE HARMFUL EVENT LOCATION CODE LIST
ON REVERSE SIDE

11
PROBABLE ACCIDENT CAUSE/FACTOR
SEE PROBABLE ACCIDENT CAUSE/FACTOR CODE LIST
ON REVERSE SIDE

TYPE UNIT
01 - AUTOMOBILE
12 - PICKUP TRUCK
13 - TRUCK TRACTOR
14 - OTHER TRUCK
25 - MOTORCYCLE
26 - MOPED
27 - PEDALCYCLE
28 - MINIBIKE
38 - ANIMAL DRAWN VEHICLE
39 - ANIMAL (RIDDEN)
41 - PEDESTRIAN
51 - TRAIN
61 - SCHOOL BUS
62 - PASSENGER BUS
98 - OTHER
99 - UNKNOWN (HIT & RUN ONLY)

UNIT NO.1 12
UNIT NO.2 13

VEHICLE USE
01 - PERSONAL
02 - DRIVER TRAINING
03 - CONSTRUCTION/MAINT
04 - AMBULANCE
05 - MILITARY
06 - TRANSPORT PASSENGERS
07 - TRANSPORT PROPERTY
08 - FARM USE
09 - WRECKER OR TOW
10 - POLICE
11 - GOVERNMENT
12 - FIRE FIGHTING
99 - OTHER

UNIT NO.1 14
UNIT NO.2 15

ATTACHMENTS
1 - NONE
2 - MOBILE HOME
3 - SEMI TRAILER
4 - UTILITY TRAILER
5 - FARM TRAILER
6 - TRAILER WITH BOAT
7 - CAMPER TRAILER
8 - TOWED MOTOR VEHICLE
9 - PETROLEUM TANKER
A - LOWBOY TRAILER
B - AUTO CARRIER TRAILER
C - OTHER TANKER
D - FLAT BED
E - OTHER
F - TWIN TRAILERS

UNIT NO.1 16
UNIT NO.2 17

DRIVER LICENSE RESTRICTIONS NOT COMPLIED WITH
A - CORRECTIVE LENSES
B - SPECIAL RESTRICTED
C - NO INTERSTATE DRIVING
D - NOT TO EXCEED 50 MPH
E - NEIGHBORHOOD ONLY
F - PREVIOUS DUI
G - HAND CONTROLS
H - STEERING KNOB
J - AUTOMATIC TRANSMISSION
K - POWER STEERING/BRAKES
L - OTHER
M - OUTSIDE MIRROR
N - TURN SIGNALS

UNIT NO.1 18
UNIT NO.2 19

VISION OBSTRUCTION
0 - NONE
1 - BUILDING
2 - SIGN
3 - VEGETATION
4 - SNOW BANK
5 - HILL
6 - CURVE IN ROAD
7 - VEHICLES
8 - SUNLIGHT, HEADLIGHTS
9 - OTHER (DUST, SMOKE, E.G.)

UNIT NO.1 20
UNIT NO.2 21

VEHICLE DEFECT
00 - NONE
01 - BRAKES
02 - STEERING
03 - POWER PLANT
04 - SUSPENSION
05 - TIRES
06 - EXHAUST
07 - LIGHTS
08 - SIGNALS
09 - WINDOWS/WINDSHIELD
10 - RESTRAINT SYSTEMS
11 - WHEELS
12 - TRUCK COUPLING
13 - CARGO
14 - FUEL SYSTEM
97 - OTHER
99 - UNKNOWN

UNIT NO.1 22
UNIT NO.2 23

PEDESTRIAN/PEDALCYCLIST ACTION
10 - ENTERING OR CROSSING SPECIFIED LOCATION
11 - ENTERING OR CROSSING ROADWAY
12 - ENTERING OR CROSSING FROM IN FRONT OF OR BEHIND OTHER VEHICLE
20 - WALKING OR RIDING WITH TRAFFIC
30 - WALKING OR RIDING AGAINST TRAFFIC
52 - APPROACHING OR LEAVING A VEHICLE
62 - PUSHING OR WORKING ON VEHICLE
68 - WORKING IN ROADWAY
70 - STANDING
74 - PLAYING IN ROADWAY
75 - LYING AT OR IN LOCATION SPECIFIED
76 - SITTING AT OR IN LOCATION SPECIFIED
97 - OTHER

UNIT NO.1 24
UNIT NO.2 25

PEDESTRIAN/PEDALCYCLIST VISIBILITY
0 - NO VISIBILITY
1 - CLOTHING CONTRASTS WITH BACKGROUND
2 - REFLECTIVE MATERIAL OR OBJECT ONLY
3 - CLOTHING CONTRASTS AND REFLECTIVE MATERIAL/OBJECT
4 - OTHER LIGHT SOURCE USED
5 - CLOTHING CONTRASTS AND OTHER LIGHT SOURCE USED
6 - REFLECTIVE MATERIAL AND OTHER LIGHT SOURCE USED
7 - CLOTHING CONTRASTS AND REFLECTIVE MATERIAL AND OTHER LIGHT SOURCE USED
9 - UNKNOWN

UNIT NO.1 26
UNIT NO.2 27

ALCOHOL/DRUG TEST TYPE
CODE FIRST POSITION
SCREENING TEST ADMINISTERED
0 - NO
1 - YES

CODE SECOND POSITION
0 - NO TEST
1 - BLOOD TEST
2 - BREATH TEST
3 - URINE TEST
7 - UNABLE TO ADMINISTER
8 - REFUSED TEST
9 - TEST PENDING

UNIT NO.1 28
UNIT NO.2 29

OCCUPANT SEAT LOCATION
11 - DRIVER SEAT
12 - CENTER FRONT SEAT
13 - RIGHT FRONT SEAT
21 - LEFT SECOND ROW SEAT
22 - CENTER SECOND ROW SEAT
23 - RIGHT SECOND ROW SEAT
31 - LEFT THIRD ROW SEAT
32 - CENTER THIRD ROW SEAT
33 - RIGHT THIRD ROW SEAT
40 - SLEEPER BERTH
70 - OTHER POSITION IN VEHICLE
71 - ANY POSITION ON OUTSIDE OF VEHICLE

RESTRAINT EQUIPMENT USE
00 - NO SAFETY EQUIPMENT
11 - LAP BELT USED
01 - LAP BELT NOT USED
12 - LAP/SHOULDER HARNESS USED
02 - LAP/SHOULDER HARNESS NOT USED
13 - PASSIVE BELT/HARNESS USED
03 - PASSIVE BELT/HARNESS NOT USED
14 - CHILD/YOUTH RESTRAINT USED
04 - CHILD/YOUTH RESTRAINT NOT USED
15 - AIR BAG DEPLOYED
05 - AIR BAG NOT DEPLOYED
16 - SAFETY BLANKET DEPLOYED
06 - SAFETY BLANKET NOT DEPLOYED
17 - SAFETY PADDING PRESENT
18 - MOTORCYCLE HELMET USED
08 - MOTORCYCLE HELMET NOT USED
99 - UNKNOWN

TEST RESULTS
DRUG TEST RESULTS

CODE FIRST POSITION:

0 - NEGATIVE OR NOT GIVEN
1 - POSITIVE
9 - RESULTS PENDING

ALCOHOL TEST RESULTS

CODE NEXT TWO POSITIONS:

LEVEL OF BLOOD ALCOHOL TEST RESULTS

UNIT NO.1 30
UNIT NO.2 31

LOCATION AFTER IMPACT
1 - NOT EJECTED/TRAPPED
2 - TOTAL EJECTION
3 - PARTIAL EJECTION
4 - TRAPPED
5 - UNKNOWN

DRIVER INTENTIONS
SEE DRIVER INTENTIONS CODE LIST
ON REVERSE SIDE

UNIT NO.1 32
UNIT NO.2 33

ACCIDENT SEVERITY
0 - NO INJURY
1 - POSSIBLE INJURY
2 - NON INCAPACITATING INJURY
3 - INCAPACITATING INJURY
4 - FATAL

VEHICLE MANEUVER
SEE VEHICLE MANEUVER CODE LIST
ON REVERSE SIDE

UNIT NO.1 34
UNIT NO.2 35

UNIT	SEX	RACE	AGE	SEAT-ING	REST-RAINT	EJECT	INJURY

#9 FIRST HARMFUL EVENT

NON COLLISION
01 OVERTURN
02 FIRE EXPLOSION
03 IMMERSION
04 GAS INHALATION
05 THROWN OR FALLING OBJECT
06 SPILL
09 OTHER NON COLLISION

COLLISION
10 PEDESTRIAN

VEHICLE IN TRANSPORT
20 OTHER
21 HEAD ON
22 REAR END
23 ANGLE
24 SIDESWIPE
25 BACKED INTO
30 PARKED VEHICLE
31 STOPPED VEHICLE
35 RAILWAY TRAIN
40 PEDALCYCLIST
42 MOPED

ANIMAL
44 DOMESTIC ANIMAL WITH RIDER
45 DOMESTICATED
46 WILD OTHER THAN DEER
47 DEER
49 OTHER

FIXED OBJECT
51 HIGHWAY GUARDRAIL
52 IMPACT ATTENUATOR CRASH CUSHION
53 UTILITY POLE
54 LIGHT STANDARD
55 TREE
56 FIRE HYDRANT
57 PIER OR COLUMN
58 OVERHEAD SIGN SUPPORT
59 HIGHWAY SIGN
60 TRAFFIC SIGNAL POST
63 BARRICADE
64 HIGHWAY STRUCTURE, BRIDGE, OVERPASS
65 CULVERT HEADWALL
66 CURBING
67 RETAINING WALL
68 DIVIDER FIN CONCRETE OR STEEL
69 ROCK OR STONE SIDESLOPE
70 EARTH SIDESLOPE
71 BUILDING
72 FENCE OTHER THAN MEDIAN
73 BOULDER
74 DITCH
75 OVERHEAD STRUCTURE, UNDERPASS
76 OTHER FIXED OBJECT
77 TRASH DUMPSTER

OTHER
90 OTHER OBJECT (IE. FOREIGN MATERIAL)
93 ROAD DEFECT
99 OTHER

#10 HARMFUL EVENT LOCATION

ON TRAFFICWAY
ON ROADWAY
01 AT INTERSECTION
02 AT INTERSECTION IN CROSSWALK
03 NONJUNCTION
04 NONJUNCTION IN CROSSWALK
05 ON ISLAND
06 ON ISLAND CROSSWALK
07 INTERCHANGE RAMP
09 OTHER

OFF ROADWAY
21 MEDIAN
22 ISLAND
23 SHOULDER, LEFT
24 SHOULDER, RIGHT
25 DRIVEWAY ACCESS
26 DRIVEWAY ACCESS IN CROSSWALK
27 ROADSIDE, LEFT
28 ROADSIDE, RIGHT
29 SIDEWALK, LEFT
30 SIDEWALK, RIGHT
39 OTHER

OFF TRAFFICWAY
41 OUTSIDE TRAFFICWAY, LEFT
42 OUTSIDE TRAFFICWAY, RIGHT

#11 PROBABLE CAUSE

DRIVER
00 UNDER THE INFLUENCE OF ALCOHOL AND DRUGS
01 UNDER THE INFLUENCE OF DRUGS
02 UNDER THE INFLUENCE OF ALCOHOL
03 FAILED TO YIELD RIGHT OF WAY
04 DISREGARDED TRAFFIC SIGNS SIGNALS
05 EXCEEDED STATED SPEED LIMIT
06 RAN OFF ROAD
07 MADE AN IMPROPER TURN
08 WRONG SIDE OR WRONG WAY
09 FOLLOWED TOO CLOSELY
10 IMPROPER LANE CHANGE
11 IMPROPER BACKING OPERATION
12 IMPROPER PASSING
13 IMPROPER SIGNAL
14 IMPROPER PARKING
15 FELL ASLEEP, FAINTED ETC
16 DID NOT COMPLY WITH LICENSE RESTRICTION
17 HANDICAPPED
18 INATTENTION
19 OTHER

ENVIRONMENT
20 SMOKE
21 FOG, SMOG
22 SLEET, HAIL
23 BLOWING SAND SOIL DIRT
24 SEVERE CROSSWINDS
25 RAIN SNOW
26 SIGN OBSTRUCTION
27 VEGETATION OBSTRUCTION
28 SNOW BANK OBSTRUCTION
29 HILL OBSTRUCTION
30 BUILDING OBSTRUCTION
31 CURVE IN ROADWAY
32 ANIMAL IN ROADWAY
39 OTHER

OTHER PERSON (NOT A DRIVER OR PASSENGER)
40 UNDER THE INFLUENCE OF ALCOHOL AND DRUGS
41 UNDER THE INFLUENCE OF DRUGS
42 UNDER THE INFLUENCE OF ALCOHOL
43 FAILED TO YIELD RIGHT OF WAY
44 DISREGARDED TRAFFIC CONTROL DEVICE
45 ILLEGALLY IN ROADWAY
46 BICYCLE VIOLATION
47 CLOTHING NOT VISIBLE
49 OTHER

PASSENGER
51 PASSENGER UNDER THE INFLUENCE OF DRUGS
52 PASSENGER UNDER THE INFLUENCE OF ALCOHOL
53 PASSENGER OBSTRUCTED DRIVER'S VIEW
54 FELL OFF VEHICLE
59 OTHER

ROAD
61 WET
62 ICY
63 SLUSHY
64 DEBRIS
65 RUTS, HOLES, BUMPS
66 ROAD UNDER CONSTRUCTION/MAINTENANCE
67 WORN TRAVEL POLISHED SURFACE
68 OBSTRUCTION
69 TRAFFIC CONTROL DEVICE INOPERATIVE
70 SHOULDERS LOW, SOFT, OR HIGH
79 OTHER

VEHICLE
81 BRAKE
82 STEERING
83 POWER PLANT
84 SUSPENSION
85 TIRES
86 EXHAUST
87 LIGHTS
88 SIGNALS
89 WINDOWS/WINDSHIELD
90 RESTRAINT SYSTEMS
91 WHEELS
92 TRUCK COUPLING
93 CARGO
94 FIRE
96 JACK-KNIFED

OTHER
99 OTHER

#32 & 33 DRIVER INTENTIONS

TRAFFIC UNIT MANEUVERING FOR TRAFFIC CONTROLS INTERSECTIONS OR RAILROAD CROSSINGS
00 NO EXTERNAL CAUSE OF MANEUVER
01 TRAFFIC SIGNAL
02 STOP SIGN
03 YIELD SIGN
04 UNCONTROLLED INTERSECTION
05 CROSSWALK NOT AT INTERSECTION
06 POLICE OFFICER SCHOOL CROSSING GUARD, ETC.
07 RAILROAD CROSSING
08 RAILROAD CROSSING FLASHER OR GATE
09 OTHER CONTROL

TRAFFIC UNIT MANEUVERING OR AVOIDING SOMETHING IN ROADWAY
10 PEDESTRIAN
11 PEDALCYCLE
12 OTHER ROAD VEHICLE (EXCEPT PEDALCYCLE)
13 OTHER VEHICLE
14 ANIMAL
15 FOREIGN OBJECT IN ROADWAY
16 WATER ICE SNOW, OR HAZARDOUS SUBSTANCE ON ROAD
17 ROAD DEFECT
18 ROAD MAINTENANCE OR CONSTRUCTION WORK
19 FIXED OBJECT OR STRUCTURE
20 FOG SMOKE, OR DUST
21 PREVIOUS ACCIDENT
22 OTHER EVENT
23 CURVE IN ROADWAY
24 RESTRICTION IN ROADWAY WIDTH
25 CHANGE IN ROADWAY ALIGNMENT
26 SHOULDER
27 LOOSE GRAVEL IN ROADWAY
28 UNKNOWN OBJECT, EVENT, OR FEATURE

TRAFFIC UNIT MANEUVER BECAUSE OF MECHANICAL FAILURE:
29 TIRE FAILURE
30 STEERING GEAR FAILURE
31 ENGINE FAILURE
32 WINDSHIELD WIPER FAILURE
33 LOAD SPILLED OR DROPPED
34 INVOLVED IN PREVIOUS ACCIDENT
35 OTHER FAILURE

TRAFFIC UNIT MANEUVER FOR OWN INTENDED MOVEMENT:
36 MOVING STRIGHT AHEAD IN PROPER DIRECTION, INCLUDING CURVES IN ROADWAY
37 MERGE WITH TRAFFIC ON LEFT
38 MERGE WITH TRAFFIC ON RIGHT
39 LEFT TURN
40 RIGHT TURN
41 U TURN
42 ENTER ROADWAY FROM ENTRANCE RAMP ON LEFT
43 ENTER ROADWAY FROM ENTRANCE RAMP ON RIGHT
44 ENTER ROADWAY FROM SHOULDER ON LEFT
45 ENTER ROADWAY FROM SHOULDER ON RIGHT
46 ENTER ROADWAY FROM PARKING AT LEFT CURB
47 ENTER ROADWAY FROM PARKING AT RIGHT CURB
48 LEAVE ROADWAY TO EXIT RAMP ON LEFT
49 LEAVE ROADWAY TO EXIT RAMP ON RIGHT
50 LEAVE ROADWAY TO SHOULDER ON LEFT
51 LEAVE ROADWAY TO SHOULDER ON RIGHT
52 LEAVE ROADWAY TO PARKING AT LEFT CURB
53 LEAVE ROADWAY TO PARKING AT RIGHT CURB
54 LEAVE ROADWAY TO DRIVEWAY ON LEFT
55 LEAVE ROADWAY TO DRIVEWAY ON RIGHT
56 BOARD OR DISCHARGE PASSENGER
80 BACKING

TRAFFIC UNIT MANEUVER AROUND OTHER TRAFFIC UNIT(S):
57 OVERTAKING SUBJECT UNIT ON LEFT
58 OVERTAKING SUBJECT UNIT ON RIGHT
59 CHANGING LANES TO LEFT
60 CHANGING LANES TO RIGHT
61 MERGING FROM LEFT
62 MERGING FROM RIGHT
63 ON RIGHT SIDE OF ROADWAY
64 IN WRONG DIRECTION ON ONE WAY ROADWAY
65 SWERVING TO LEFT
66 SWERVING TO RIGHT
67 SLOWING OR STOPPING
68 STOPPED IN TRAFFIC
69 STOPPED TO BOARD OR DISCHARGE PASSENGER
70 SKIDDING SPINNING, OR YAWING
71 JACK KNIFING
72 TURNING LEFT FROM SAME DIRECTION
73 TURNING LEFT FROM OPPOSITE DIRECTION
74 MAKING U TURN
75 TURNING RIGHT FROM SAME DIRECTION
76 TURNING RIGHT FROM OPPOSITE DIRECTION
77 ENTERING ROADWAY FROM RAMP ON LEFT
78 ENTERING ROADWAY FROM RAMP ON RIGHT
79 ENTERING ROADWAY FROM ROADWAY ON LEFT

#34 & 35 VEHICLE MANEUVER

MOVEMENTS ESSENTIALLY STRAIGHT AHEAD
00 MOVING STRAIGHT, DETAILS UNKNOWN
01 STRAIGHT AHEAD IN PROPER DIRECTION, INCLUDING CURVES IN ROADWAY
02 OVERTAKING OTHER VEHICLE ON LEFT, LEFT OF CENTER LINE
03 OVERTAKING OTHER VEHICLE ON LEFT, RIGHT OF CENTER LINE (USE ON ONE WAY TRAFFIC)
04 OVERTAKING ANOTHER VEHICLE ON RIGHT
05 STRAIGHT AHEAD IN LEFT TURN LANE
06 STRAIGHT AHEAD IN RIGHT TURN LANE
07 CHANGING LANES TO LEFT
08 CHANGING ALNES TO RIGHT
09 MERGING FROM LEFT (ROADWAY NARROWS ON LEFT)
10 MERGING FROM RIGHT (ROADWAY NARROWS ON RIGHT)
11 ON WRONG SIDE OF ROADWAY
12 IN WRONG DIRECTION ON ONE WAY ROADWAY
13 SWERVING TO LEFT
14 SWERVING TO RIGHT
15 SLOWING OR STOPPING
16 SKIDDING LONGITUDINALLY
17 SKIDDING LATERALLY
18 SPINNING OR YAWING
19 JACK KNIFING
20 STOPPED IN TRAFFIC
21 STARTING FROM STOP
22 INCREASED SPEED

TURNING MOVEMENTS
30 TURNING, DETAILS UNKNOWN
31 LEFT FROM LEFT TURN BAY
32 LEFT FROM LEFT (PROPER) LANE
33 LEFT FROM OTHER LANE, LEGAL
34 LEFT FROM OTHER LANE, ILLEGAL
35 LEFT FROM UNKNOWN LANE
36 U TURN
37 RIGHT FROM SPECIAL LANE
38 RIGHT FROM RIGHT (PROPER) LANE
39 RIGHT FROM OTHER LANE, LEGAL
40 RIGHT FROM OTHER LANE, ILLEGAL
41 RIGHT FROM UNKNOWN LANE

ENTERING TRAFFIC LANE
50 ENTERING TRAFFIC LANE, DETAILS UNKNOWN
51 FROM ENTRANCE RAMP ON LEFT
52 FROM ENTRANCE RAMP ON RIGHT
53 FROM SHOULDER ON LEFT
54 FROM SHOULDER ON RIGHT
55 FROM PARKING SPACE AT LEFT CURB
56 FROM PARKING SPACE AT RIGHT CURB
57 FROM DRIVEWAY ON LEFT
58 FROM DRIVEWAY ON RIGHT

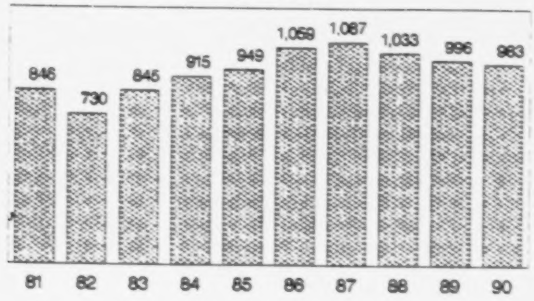
LEAVING TRAFFIC LANE
60 LEAVING TRAFFIC LANE, DETAILS UNKNOWN
61 TO EXIT RAMP ON LEFT
62 TO EXIT RAMP ON RIGHT
63 TO SHOULDER ON LEFT
64 TO SHOULDER ON RIGHT
65 TO PARKING SPACE AT LEFT CURB
66 TO PARKING SPACE AT RIGHT CURB
67 TO DRIVEWAY ON LEFT
68 TO DRIVEWAY ON RIGHT

PARKING ON OR ADJACENT TO TRAFFIC LANE
70 PARKING, DETAILS UNKNOWN
71 ON LEFT SHOULDER
72 ON RIGHT SHOULDER
73 AT LEFT CURB
74 AT RIGHT CURB
75 IN TRAFFIC LANE ON LEFT (RURAL)
76 IN TRAFFIC LANE ON RIGHT (RURAL)
77 DOUBLE PARKED ON LEFT
78 DOUBLE PARKED ON RIGHT

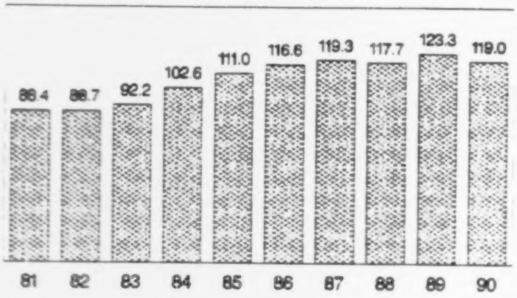
MISCELLANEOUS MOVEMENTS
80 OTHER MISCELLANEOUS, DETAILS UNKNOWN
81 BACKING IN ROADWAY
82 BACKING FROM ANGLE, PARKING ON LEFT
83 BACKING FROM ANGLE, PARKING ON RIGHT
84 BACKING ACROSS TRAFFIC
85 BACKING ON SHOULDER
86 VEHICLE PUSHED BY OTHER VEHICLE
87 VEHICLE PUSHED BY PEDESTRIAN
88 DRIVERLESS VEHICLE IN MOTION
89 NOT IN MOTION (PARKED, ABANDONED, OR STANDING)
99 UNKNOWN

SOUTH CAROLINA
TEN YEAR TRAFFIC TRENDS
1981–1990

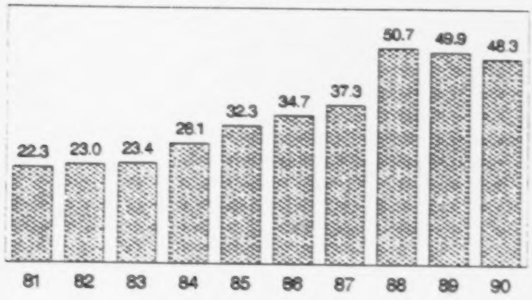
TRAFFIC DEATHS
NUMBER OF DEATHS



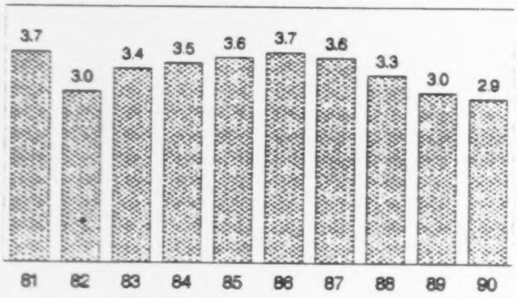
MOTOR VEHICLE ACCIDENTS
THOUSANDS OF ACCIDENTS



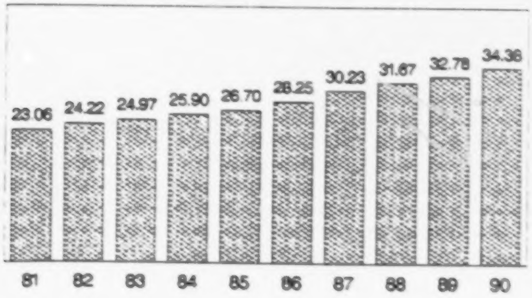
INJURIES
THOUSANDS OF INJURIES



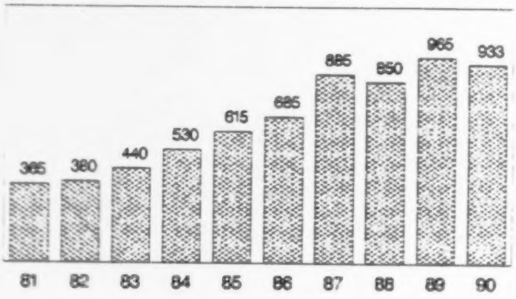
MILEAGE DEATH RATE
DEATHS PER 100 MILLION VEHICLE MILES



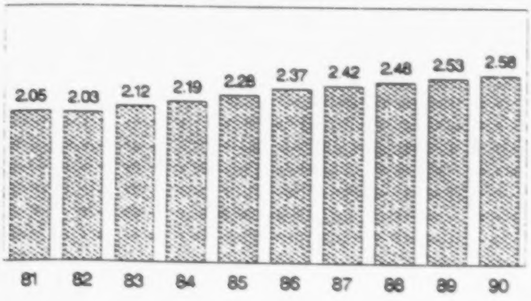
VEHICLE MILES TRAVELED
BILLIONS OF MILES



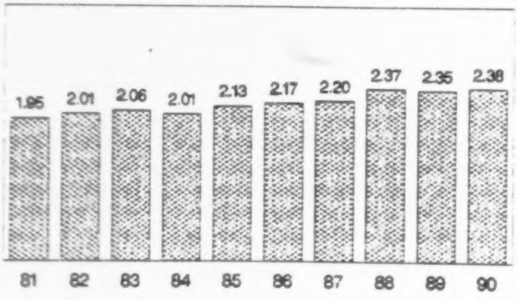
ECONOMIC LOSS
MILLIONS OF DOLLARS



MOTOR VEHICLE REGISTRATIONS
MILLIONS OF VEHICLES



LICENSED DRIVERS
MILLIONS OF DRIVERS



SOUTH CAROLINA

TRAFFIC ACCIDENTS, DEATHS, INJURIES, DEATH RATE AND VEHICLE MILES OF TRAVEL

1961 - 1990

YEARS	ACCIDENTS	DEATHS	INJURIES	DEATH RATE*	VMT**
1961	37,291	734	15,103	7.8	9,412
1962	40,519	757	15,851	7.6	9,882
1963	44,233	796	17,652	7.7	10,347
1964	48,419	870	18,271	8.0	10,868
1965	51,389	868	17,608	7.5	11,581
1966	55,697	968	18,598	7.7	12,433
1967	54,747	913	18,892	7.0	13,086
1968	58,197	997	21,459	7.0	14,191
1969	59,033	996	20,203	6.4	15,512
1970	67,808	1,033	19,864	6.2	16,558
1971	74,607	1,023	19,347	5.8	17,763
1972	81,525	1,099	20,283	5.6	19,472
1973	85,071	967	20,440	4.7	20,428
1974	76,986	873	18,863	4.4	20,012
1975	80,740	821	19,407	4.0	20,603
1976	86,944	820	21,201	3.7	21,961
1977	91,485	949	21,382	4.2	22,689
1978	97,883	898	23,223	3.7	24,254
1979	97,394	900	23,815	3.7	24,074
1980	91,016	859	22,599	3.8	22,658
1981	88,425	846	22,355	3.7	23,056
1982	88,798	730	23,019	3.0	24,222
1983	92,277	845	23,458	3.4	24,978
1984	102,617	915	28,135	3.5	25,900
1985	111,077	949	32,388	3.6	26,679
1986	116,573	1,059	34,689	3.7	28,247
1987	119,344	1,087	37,287	3.6	30,227
1988	117,723	1,033	50,713***	3.3	31,672
1989	123,252	996	49,905	3.0	32,781
1990	118,989	983	48,337	2.9	34,377
TOTALS	**2,460,059**	**27,584**	**744,347**	-	**619,923**

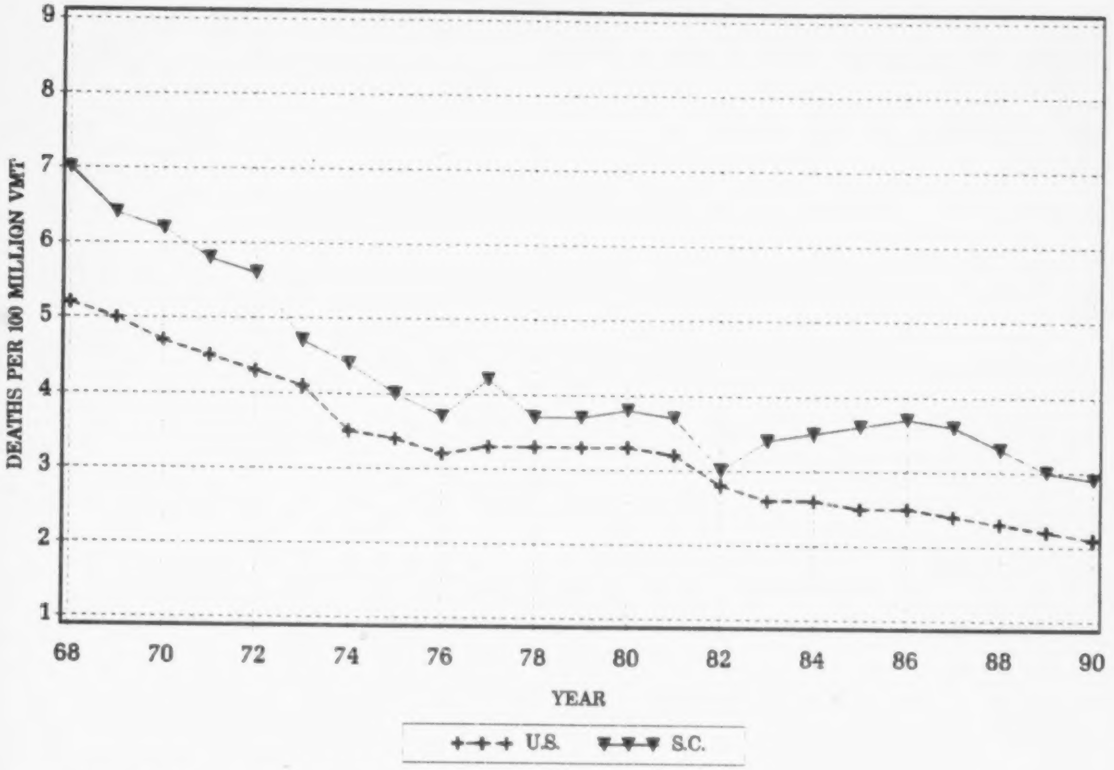
---

* Per 100 million miles of vehicle travel.

** Vehicle Miles Of Travel in millions of miles.

*** This was the first year of the new reporting format. Far more "possible injuries" were reported than in previous years, rendering comparisons with prior years invalid.

MOTOR VEHICLE MILEAGE DEATH RATE
SOUTH CAROLINA VS. U.S.
1968 – 1990



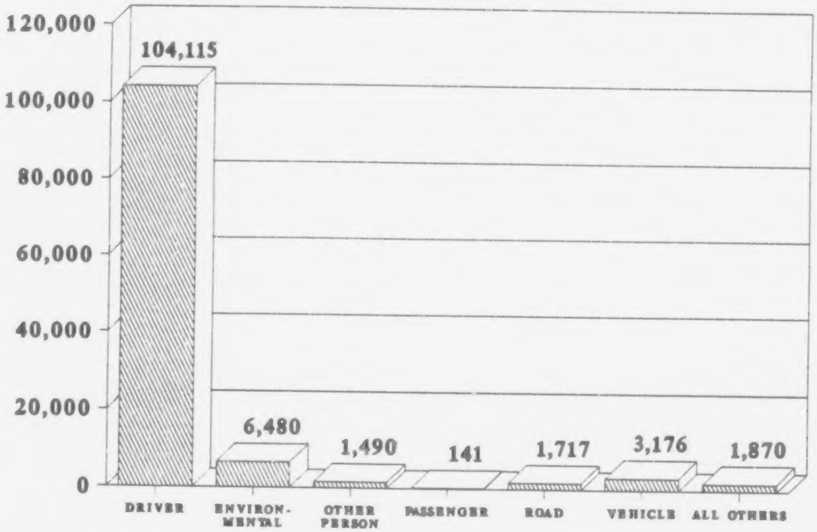
Source For U.S. Data: – Fatal Accident Reporting System.
1990 U.S. Data is preliminary.

From 1967 until 1982, South Carolina's traffic mileage death rate (defined as the number of persons killed per hundred million vehicle miles traveled, also referred to as the MDR), declined from 7.0 to 3.0. At the time, the 1982 rate was the lowest in the state's motor vehicle history. Beginning in 1983, the downward trend reversed and by 1986, the MDR stood at 3.7, the same as in 1978, eight years earlier. Beginning in 1987, the MDR again started to decline and by 1990 reached 2.9. This was the first time an MDR of under 3 was achieved in South Carolina. This improvement was due to a 1.3% reduction in fatalities coupled with a 4.9% increase in mileage traveled. Nationally, preliminary estimates indicate an MDR of 2.1, the lowest ever recorded nationally. Despite a reduction for the fourth straight year, the South Carolina MDR remained 38% higher than the national rate in 1990.

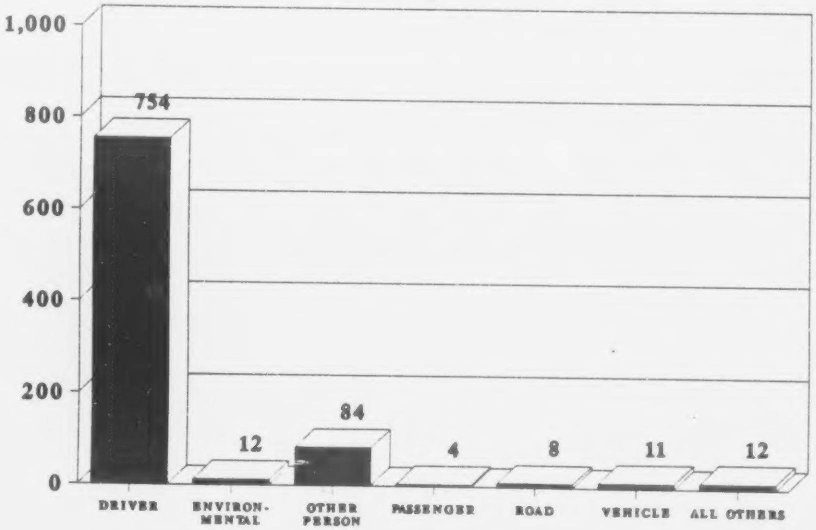
TRAFFIC ACCIDENTS BY PROBABLE CAUSE - 1990

	TYPE ACCIDENT				PERSONS	
	Fatal	Injury	PDO	Total	Killed	Injured
DRIVER						
UNDER INF. ALC. & DRUGS	26	503	693	1,222	26	790
UNDER INF. OF DRUGS	2	90	192	284	2	163
UNDER INF. OF ALCOHOL	161	2,332	2,938	5,431	179	3,838
FAILED TO YIELD R.O.W.	81	6,483	17,315	23,879	92	11,370
DISREGARDED SIGN/SIGNAL	39	2,067	3,524	5,630	43	3,859
EXCEEDED SPEED LIMIT	123	1,757	3,117	4,997	142	2,800
RAN OFF ROAD	82	1,122	2,602	3,806	90	1,610
MADE AN IMPROPER TURN	9	530	2,965	3,504	10	874
WRONG SIDE OR WAY	64	642	1,445	2,151	81	1,227
FOLLOWED TOO CLOSELY	3	2,127	7,433	9,563	3	3,413
IMPROPER LANE CHANGE	9	499	4,363	4,871	9	745
IMPROPER BACKING	3	202	3,094	3,299	5	295
IMPROPER PASSING	15	363	1,601	1,979	16	631
IMPROPER SIGNAL	1	17	87	105	1	43
IMPROPER PARKING	0	43	290	333	0	61
FELL ASLEEP, FAINTED	37	760	987	1,784	39	1,014
DIDN'T COMPLY W/LIC REST.	0	11	8	19	0	11
HANDICAPPED	1	12	39	52	1	34
INATTENTION	65	5,581	19,503	25,149	74	8,798
OTHER	33	1,389	4,635	6,057	37	2,154
ENVIRONMENT						
SMOKE, FOG, SMOG	4	41	123	168	4	68
SLEET, HAIL	0	6	12	18	0	22
BLOWING SAND, SOIL, DIRT	0	10	22	32	0	15
SEVERE CROSSWIND	0	8	29	37	0	8
RAIN, SNOW	4	206	651	861	5	307
SIGN OBSTRUCTION	0	4	10	14	0	10
VEGETATION OBSTRUCTION	0	15	78	93	0	16
SNOW BANK OBSTRUCTION	0	3	4	7	0	3
HILL/BUILDING OBSTRUCTION	0	11	32	43	0	12
CURVE IN ROADWAY	1	15	48	64	1	21
ANIMAL IN ROADWAY	1	452	4,274	4,727	1	586
OTHER	2	87	327	416	2	135
OTHER PERSON						
UNDER INFL. ALC. OR DRUGS	18	133	54	205	19	151
FAILED TO YIELD R.O.W.	16	181	242	439	16	242
DISREGARDED TRF. CONTROL	1	26	45	72	1	42
ILLEGALLY IN ROADWAY	31	228	84	343	31	254
BICYCLE VIOLATION	4	121	34	159	4	131
CLOTHING NOT VISIBLE	7	29	17	53	7	30
OTHER	7	94	118	219	7	102
PASSENGER						
UNDER INFL. ALC. OR DRUGS	0	6	5	11	0	8
PASS. OBST. DRIVERS VIEW	0	2	6	8	0	2
FELL OFF VEHICLE	3	32	7	42	3	36
OTHER	1	35	44	80	1	53
ROAD						
WET	5	235	831	1,071	5	375
ICY, SLUSHY	1	0	9	10	1	0
DEBRIS	0	29	152	181	0	47
RUTS, HOLES, BUMPS	0	22	58	80	0	34
ROAD UNDER CONST./MAINT.	0	10	37	47	0	20
WORN POLISHED SURFACE	0	2	8	10	0	2
OBSTRUCTION IN ROAD	0	14	72	86	0	15
TRAFFIC CONT. INOPERATIVE	1	17	28	46	1	37
SHOULDERS LOW, HIGH, SOFT	1	10	34	45	1	13
OTHER	0	21	120	141	0	30
VEHICLE						
BRAKES	1	358	924	1,283	1	621
STEERING	2	72	140	214	2	97
POWER PLANT	0	49	124	173	0	78
SUSPENSION OR EXHAUST	0	13	28	41	0	21
TIRES	2	135	475	612	2	206
LIGHTS	1	55	92	148	1	83
SIGNALS/WINDOWS/W'SHIELD	0	9	36	45	0	13
RESTRAINT SYSTEMS	0	1	16	17	0	1
WHEELS	1	19	124	144	1	38
TRUCK COUPLING	0	11	53	64	0	16
CARGO	2	41	303	346	2	47
FIRE	0	5	11	16	0	5
JACK-KNIFED	2	14	57	73	2	30
OTHER CAUSES	12	359	1,499	1,870	12	524
TOTALS	885	29,776	88,328	118,989	983	48,337

ALL ACCIDENTS BY PROBABLE CAUSE
1990



FATAL ACCIDENTS BY PROBABLE CAUSE
1990



Probable Cause

Some action (or inaction) by one or more of the drivers was cited as the probable cause in 104,115 of the reported traffic accidents in 1990. This accounted for 87.5% of all probable accident causes, a percentage slightly higher than the 85.3% in 1989. In fact, of the 10 leading probable causes, nine were driver-related. Environmental factors accounted for the next largest category of accident causes with 6,480 or 5.4% of the total. The "Other Person", "Passenger", "Road" and "Vehicle" categories each accounted for less than 3% of all reported traffic accidents in 1990. The top ten probable accident causes in 1990 were as follows: 1) Inattention (25,149); 2) Failure to Yield Right of Way (23,879); 3) Following Too Closely (9,563); 4) Driver - Other (6,057); 5) Disregarded Sign/Signal (5,630); 6) Exceeded Speed Limit (4,997); 7) Driver Under the Influence of Alcohol (5,431); 8) Improper Lane Change (4,871); 9) Animal in Roadway (4,727); and 10) Ran Off the Road (3,806). The "Animal in Roadway" figure represents a 16% increase over 1989, by far the largest percentage increase of the top 10 causes.

For fatal accidents in 1990, some type of driver error was considered the probable cause in 754 of the 885 accidents accounting for 85.2% of all accidents in which someone was killed. This percentage is slightly lower than for all accidents. The specific causes of fatal accidents were quite different from all accidents. The leading probable cause of fatal accidents was "Driver Under the Influence of Alcohol" with 161 or 18.2% of the total. The second leading cause was "Driver Exceeding the Speed Limit" with 123 or 13.9%. Taken together, the three "Driver Under the Influence" causes accounted for 189 or 21.4% of the fatal accidents, more than twice the 9.8% reported for injury accidents and more than 4 times the 4.3% reported in property damage only accidents. The proportion of "Other Person" causes was also sharply higher in fatal accidents. More than 9% of the reported fatal accidents were caused by a person other than a driver of a motor vehicle. Specifically, the "Other Person Illegally in Roadway" (usually a pedestrian) accounted for 3.5% for the fatal accidents and "Other Person Under the Influence of Alcohol or Drugs" accounted for another 2%. All "Road" probable causes accounted for only 0.9% of the fatal accidents; all "Vehicle" causes for only 1.2%.

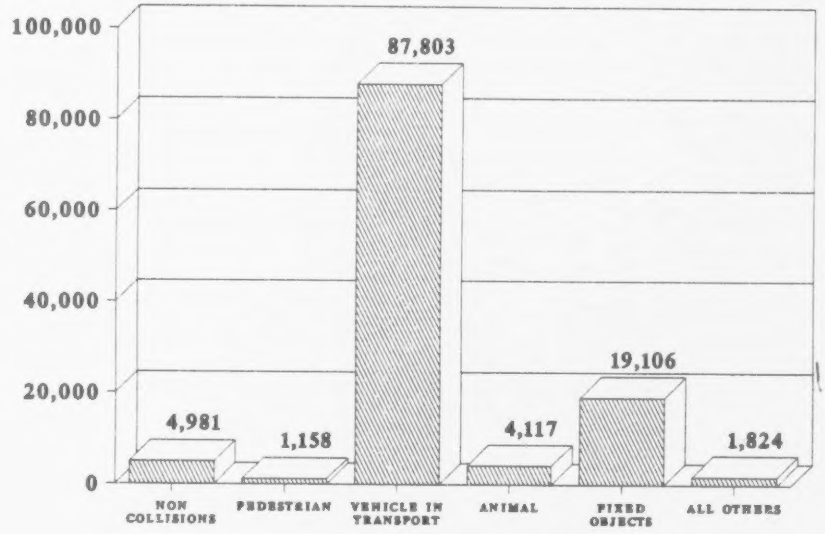
TRAFFIC ACCIDENTS BY FIRST HARMFUL EVENT - 1990

	-------- TYPE ACCIDENT --------				--- PERSONS ---	
	Fatal	Injury	PDO	Total	Killed	Injured
NON-COLLISION						
OVERTURN	66	1,133	1,738	2,937	68	1,636
FIRE/EXPLOSION	0	10	23	33	0	18
IMMERSION	5	49	127	181	5	76
GAS INHALATION	0	3	6	9	0	5
THROWN/FALLING OBJECT	0	29	255	284	0	31
SPILL (MOTORCYCLE)	0	15	74	89	0	18
OTHER NON-COLLISION	9	397	1,042	1,448	9	528
PEDESTRIAN	99	908	151	1,158	102	979
VEHICLE IN TRANSPORT						
OTHER	3	273	722	998	3	517
HEAD ON	104	1,086	1,195	2,385	133	2,344
REAR END	40	7,360	23,785	31,185	46	12,158
ANGLE	201	9,757	27,980	37,938	231	17,611
SIDESWIPE	17	1,389	9,077	10,483	18	2,364
BACKED INTO	0	173	3,060	3,233	0	249
PARKED VEHICLE	1	86	505	592	2	119
STOPPED VEHICLE	0	109	325	434	0	209
RAILWAY TRAIN	8	13	30	51	8	17
PEDALCYCLIST	11	323	65	399	11	344
MOTORCYCLIST	2	70	15	87	2	88
MOPED	0	15	3	18	0	16
ANIMAL						
ANIMAL W/RIDER	0	4	6	10	0	5
DOMESTICATED	2	76	445	523	3	96
WILD, NOT DEER	0	10	73	83	0	12
DEER	1	133	3,252	3,386	1	179
OTHER	0	24	91	115	0	37
FIXED OBJECT						
HIGHWAY GUARDRAIL	10	202	509	721	12	307
IMPACT ATTENUATER	0	7	9	16	0	10
UTILITY POLE	25	695	991	1,711	28	966
LIGHT STANDARD	2	13	31	46	2	14
TREE	124	1,507	2,163	3,794	134	2,060
FIRE HYDRANT	2	29	131	162	2	38
PIER/COLUMN	3	13	32	48	3	17
OVERHEAD SIGN SUPPORT	1	5	9	15	1	7
HIGHWAY SIGN	1	101	589	691	1	127
TRAFFIC SIGNAL POST	1	22	57	80	1	32
BARRICADE	0	11	60	71	0	14
HIGHWAY STR, BR, O'PASS*	9	88	196	293	9	124
CULVERT HEADWALL	9	89	132	230	9	136
CURBING	7	111	445	563	9	143
RETAINING WALL	3	42	125	170	4	52
DIVIDER FIN.	0	21	63	84	0	27
ROCK/STONE SIDESLOPE	0	10	37	47	0	11
EARTH SIDESLOPE	21	422	782	1,225	22	599
BUILDING	2	70	171	243	2	99
FENCE, OTHER THAN MEDIAN	10	175	839	1,024	10	222
BOULDER	0	8	14	22	0	11
DITCH	64	2,055	4,597	6,716	69	2,793
OVERHEAD STR/UNDERPASS**	1	9	22	32	1	10
OTHER FIXED OBJECT	12	206	850	1,068	13	259
TRASH DUMPSTER	0	7	27	34	0	9
OTHER						
OTHER OBJECT	1	61	458	520	1	78
ROAD DEFECT	1	16	59	76	1	22
ALL OTHERS	7	336	885	1,228	7	494
TOTALS	885	29,776	88,328	118,989	983	48,337

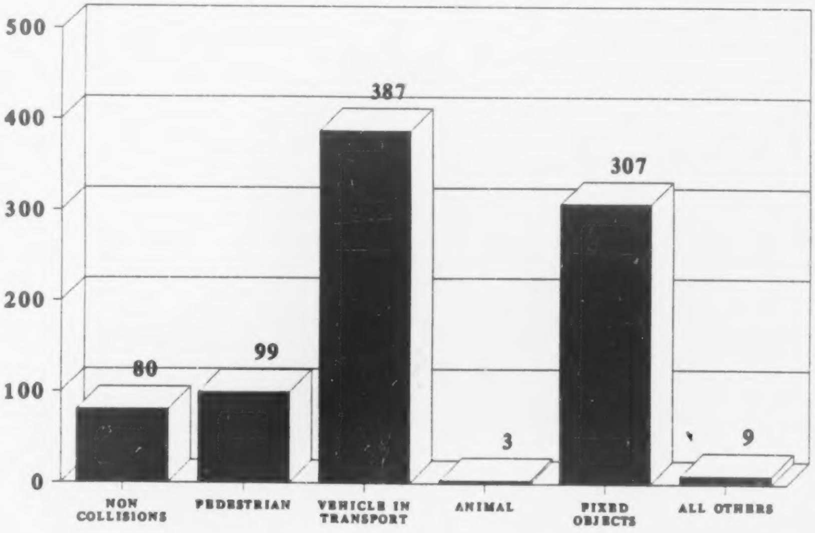
* ABBREVIATION FOR: HIGHWAY STRUCTURE, BRIDGE, OVERPASS

** ABBREVIATION FOR: OVERHEAD STRUCTURE, UNDERPASS

ALL ACCIDENTS BY FIRST HARMFUL EVENT
1990



FATAL ACCIDENTS BY FIRST HARMFUL EVENT
1990



First Harmful Event

The first harmful event (FHE) in a traffic accident is defined by the National Safety Council as the first occurrence of injury or damage in an accident. In 1990, the FHE in 87,803 of the 118,989 reported traffic accidents (73.8%) involved some type of collision between two or more vehicles in transport. The top three FHEs, all involving collisions between two or more vehicles in transport, were "angle collision", 37,938 (31.9%); "rear end collision", 31,185 (26.2%); and "sideswipe collision", 10,483 (8.8%). Combined, these three accounted for 66.9% of all reported accidents. The second largest category of FHEs involved collisions between a motor vehicle in transport and a fixed object with a total of 19,106 (16.1%) reported accidents. The leading object struck was a ditch with 6,716 (5.6%). The third leading category of FHEs was the non-collision with a total of 4,981 (4.2%) reported accidents.

The category with the largest percentage increase from 1989 involved accidents where a motor vehicle struck an animal. These accidents climbed from from 3,547 (2.9%) in 1989 to 4,117 (3.5%) in 1990, an increase of 16.1%. This entire increase can be accounted for by collisions involving a motor vehicle and a deer. These accidents increased by **21.2%** from 1989 to a total of 3,386 and accounted for 2.8% of all reported accidents in 1990, making this the sixth largest FHE.

For fatal accidents, collisions between two or more motor vehicles in transport accounted for a substantially smaller percentage (43.7%) than for property damage only accidents (75.6%). Accidents involving a "collision with a fixed object" and "collision with a pedestrian" accounted for a substantially greater percentage of the fatal accidents (34.7% and 11.2%, respectively) than for property damage only accidents (14.6% and 0.2%). The leading FHE in fatal accidents was the "angle collision" with 201 (22.7%). This was followed by "collision with a tree" with 124 (14.0%); "head on collisions" with (11.8%); and "collision with pedestrian" 99 (11.2%). The 99 fatal accidents in the "collision with pedestrian" category accounted for 8.5% of the reported total in this FHE type. By comparison, only 201 (0.5%) of the "angle collisions" and 17 (0.2%) of the "sideswipe collisions" resulted in fatalities.

PART II

ACCIDENT CHARACTERISTICS

There are many characteristics associated with traffic accidents. Patterns in these characteristics can provide insight into the causes of accidents and may ultimately lead to effective countermeasures for reducing the number of accidents which occur and minimizing the severity of those which still do occur. The data provided on the following pages may raise interesting questions among those interested in highway safety. These questions may in turn lead to research which addresses a particular accident characteristic. Here are some examples of traffic accident characteristics for 1990:

A. Driver
- Male drivers between 20 and 24 years of age are overrepresented in fatal collisions.
- Nearly two-thirds of all drivers involved in traffic accidents were not charged with any violation.
- The leading traffic violation in 1990 was "Speeding, Less Than 10 MPH Over the Limit", accounting for 27.6% of the violations charged.

B. Time
- Fatal accidents occurred more often at night than in the daytime.
- The month of May had the most fatal accidents in 1990.
- More than twice as many fatal accidents occurred on Saturday as on Wednesday in 1990.

C. Location
- More fatal accidents (34.4% of the total) occurred on secondary routes than on any other route category.
- Only 6,472, less than 5.4% of all traffic accidents occurred on the interstates. Slightly more than 7% (63 out of 885) of the fatal accidents occurred on the Interstates.

D. Environment
- The vast majority (83.7%) of all traffic accidents occurred during clear or cloudy weather conditions.
- More than 8 out of 10 fatal accidents occurred on a dry road surface.

E. Vehicles
- Automobiles constituted three-fourths of all units involved in traffic accidents during 1990.
- A total of 8.5% the traffic accidents involving railway trains, 7.7% involving pedestrians, 3.0% involving motorcycles, 3.2% involving bicycles, 4.3% involving mopeds and 2.1% involving truck tractors resulted in fatalities.

This is just a sample of some of the thought-provoking observations evident in the statistics presented on the following pages. These and other patterns indicated in the data, may merit additional research.

A. The Driver

Numerous decisions are required of drivers in the operation of a motor vehicle. All too often, poor judgment, inattention, carelessness or even deliberate intent on the part of a driver results in a dangerous driving decision, which leads to a traffic accident. The probable cause in over 87% of all reported traffic accidents was driver-related in 1990. Often, the officer investigating the accident will issue a citation to one or more of the drivers involved in traffic accidents. Listed below are the top 10 driver violations charged to drivers involved in reported traffic accidents during 1990:

	Violation	#	%
1.	Speeding < 10 MPH Over The Limit	21,670	27.6
2.	Failure To Yield Right Of Way	17,753	22.6
3.	Following Too Closely	6,181	7.9
4.	Driving Under Influence	5,531	7.0
5.	Disregarding Sign Or Signal	3,881	4.9
6.	Changing Lane Unlawfully	3,081	3.9
7.	Improper Turning Movement	2,327	3.0
8.	Drivers License Violations	1,883	2.4
9.	Backing Improperly	1,744	2.2
10.	Improper Passing	1,214	1.6
11.	All Other Violations	13,302	16.9
	TOTAL	78,567	100.0

Note: More than one violation can be charged to a driver. A total of 144,368 drivers were not charged with any violation.

Another group of driver violations which contributed to traffic accidents in 1990 involved non-compliance with drivers license restrictions. The top five restrictions not complied with by drivers involved in traffic accidents in 1990 are as follows (A citation was not necessarily issued for these, but the non-compliance did contribute to the accident occurrence.):

Restriction	#	%
1. Corrective Lens	1,780	41.4
2. Previous DUI	485	11.3
3. Special Restricted License	369	8.6
4. Not to Exceed 55 mph	24	0.5
5. Neighborhood Only	20	0.5
6. All Others	1,622	37.7
TOTAL	4,300	100.0

Enumerated on the following pages are the number of licensed drivers by age and sex, and the number of drivers involved in accidents by age and sex. Based on the figures indicated in these tables, nearly 1 out of every 5 (18.6%) licensed, male drivers between the ages of 15 and 24 years of age was involved in an accident in 1990. Just over 1 in 8 (12.8%) female drivers the same age were involved in an accident. For the entire licensed population, approximately one out of every 11 drivers was involved in an accident during the year. One out of every 810 males ages 15 to 24 was involved in a fatal accident. This was a considerable improvement over the 1989 figure of 1 in 768. This compares to 1 out of every 1,798 licensed drivers in general.

SOUTH CAROLINA DRIVERS LICENSED BY AGE AND SEX*
1990

AGE	MALE	(%)	FEMALE	(%)	TOTAL	(%)
14@	64	0.0	9	0.0	73	0.0
15	6,277	0.3	4,617	0.2	10,894	0.5
16	14,636	0.6	11,588	0.5	26,224	1.1
17	18,750	0.8	15,451	0.6	34,201	1.4
18	21,248	0.9	18,561	0.8	39,809	1.7
19	24,072	1.0	22,080	0.9	46,152	1.9
20	25,305	1.1	23,878	1.0	49,183	2.1
21	24,869	1.0	23,738	1.0	48,607	2.0
22	24,287	1.0	24,014	1.0	48,301	2.0
23	25,279	1.1	24,911	1.0	50,190	2.1
24	25,923	1.1	26,015	1.1	51,938	2.2
25-29	143,312	6.0	147,953	6.2	291,265	12.2
30-34	140,058	5.9	147,654	6.2	287,712	12.1
35-39	131,350	5.5	138,547	5.8	269,897	11.3
40-44	122,108	5.1	124,689	5.2	246,797	10.4
45-49	94,661	4.0	93,668	3.9	188,329	7.9
50-54	74,691	3.1	74,795	3.1	149,486	6.3
55-59	66,646	2.8	67,034	2.8	133,680	5.6
60-64	62,016	2.6	62,004	2.6	124,020	5.2
65-69	57,515	2.4	57,671	2.4	115,186	4.8
70+	85,749	3.6	86,099	3.6	171,848	7.2
TOTAL	1,188,816	49.9	1,194,976	50.1	2,383,792	100.0

*As of 1/11/91

@Moped License Only

ALL REPORTED ACCIDENTS
AGE AND SEX OF DRIVER
1990

AGE	--- TOTAL ACCIDENTS ---			-- FATAL ACCIDENTS --			-- INJURY ACCIDENTS --			PROPERTY DAMAGE ACCIDENTS		
	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE
14 & younger	245	174	71	8	4	4	86	63	23	151	107	44
15	2,631	1,554	1,077	5	2	3	695	397	298	1,931	1,155	776
16	5,700	3,410	2,290	27	17	10	1,458	831	627	4,215	2,562	1,653
17	6,927	4,308	2,619	40	27	13	1,820	1,089	731	5,067	3,192	1,875
18	7,825	4,910	2,915	47	39	8	2,032	1,251	781	5,746	3,620	2,126
19	8,026	5,024	3,002	43	36	7	2,037	1,274	763	5,946	3,714	2,232
20	7,270	4,467	2,803	32	25	7	1,967	1,221	746	5,271	3,221	2,050
21	7,016	4,314	2,702	38	30	8	1,821	1,091	730	5,157	3,193	1,964
22	6,443	3,872	2,571	34	20	14	1,676	1,020	656	4,733	2,832	1,901
23	6,234	3,759	2,475	41	34	7	1,592	968	624	4,601	2,757	1,844
24	6,009	3,617	2,392	40	30	10	1,534	905	629	4,435	2,682	1,753
25 to 29	29,954	17,646	12,308	199	151	48	7,597	4,348	3,249	22,158	13,147	9,011
30 to 34	24,674	14,273	10,401	153	126	27	6,210	3,509	2,701	18,311	10,638	7,673
35 to 39	20,914	12,085	8,829	137	99	38	5,157	2,890	2,267	15,620	9,096	6,524
40 to 44	16,816	9,872	6,944	123	95	28	4,193	2,347	1,846	12,500	7,430	5,070
45 to 49	11,771	7,125	4,646	71	57	14	2,884	1,665	1,219	8,816	5,403	3,413
50 to 54	8,912	5,451	3,461	70	50	20	2,092	1,201	891	6,750	4,200	2,550
55 to 59	7,608	4,753	2,855	49	45	4	1,859	1,089	770	5,700	3,619	2,081
60 to 64	6,631	4,171	2,460	43	32	11	1,565	930	635	5,023	3,209	1,814
65 to 69	5,956	3,678	2,278	34	28	6	1,446	871	575	4,476	2,779	1,697
70 & older	9,071	5,580	3,491	62	48	14	2,282	1,391	891	6,727	4,141	2,586
Unknown age	582	487	95	0	0	0	130	100	30	452	387	65
Unknown sex[1]	10,128	-	-	30	-	-	1,463	-	-	8,635	-	-
TOTALS[2]	217,343	124,530	82,685	1,326	995	301	53,596	30,451	21,682	162,421	93,084	60,702

1 - Includes drivers whose sex was not recorded on the report, plus hit and run accidents for which driver information was not determined; also includes parked cars with no driver.

2 - Adding male, female and unknown sex, totals will equal the total for all drivers.

Out of the 207,215 drivers involved in all traffic accidents and whose gender was known, 60.1% were males. For property damage only accidents, males accounted for 60.5% of the known drivers, but in fatal accidents males comprised 76.8% of all drivers. More than 18.5% of all drivers involved in fatal accidents were male drivers between the ages of 17 and 24. This group of drivers comprised just under 8% of all licensed drivers in 1990. By comparison, female drivers aged 17 to 24 were involved in 5.7% of the fatal accidents and accounted for 7.5% of the licensed drivers.

DRIVER INTENTIONS IN ALL ACCIDENTS

1990

INTENTION	Number	Percentage
TRAFFIC UNIT MANEUVERING FOR TRAFFIC CONTROLS, INTERSECTIONS OR RAILROAD CROSSINGS:		
No External Cause of Maneuver	13,259	6.1
Traffic Signal	4,660	2.1
Stop Sign	3,700	1.7
Yield Sign	691	0.3
Uncontrolled Intersection	184	0.1
Crosswalk Not At Intersection	19	0.0
Police Officer, School Crossing Guard, Etc.	132	0.1
Railroad Crossing	112	0.1
Railroad Crossing Flasher Or Gate	93	0.0
Other Control	596	0.3
TRAFFIC UNIT MANEUVERING OR AVOIDING SOMETHING IN ROADWAY:		
Pedestrian	210	0.1
Pedalcycle	97	0.0
Other Road Vehicle (Except Pedalcycle)	355	0.2
Other Vehicle	1,608	0.7
Animal	713	0.3
Foreign Object In Roadway	228	0.1
Water, Ice, Snow or Hazardous Substance in Road	142	0.1
Road Defect	23	0.0
Road Maintenance or Construction Work	45	0.0
Fixed Object or Structure	34	0.0
Fog, Smoke, or Dust	159	0.1
Previous Accidents	144	0.1
Other Event	342	0.2
Curve in Roadway	180	0.1
Restriction in Roadway Width	7	0.0
Change in Roadway Alignment	18	0.0
Shoulder	69	0.0
Loose Gravel in Roadway	10	0.0
Unknown Object, Event, or Feature	598	0.3
TRAFFIC UNIT MANEUVER BECAUSE OF MECHANICAL FAILURE:		
Tire Failure	115	0.1
Steering Gear Failure	184	0.1
Engine Failure	209	0.1
Windshield Wiper Failure	124	0.1
Load Spilled or Dropped	55	0.0
Involved in Previous Accident	83	0.0
Other Failure	469	0.2
TRAFFIC UNIT MANEUVER FOR OWN INTENDED MOVEMENT:		
Moving Straight Ahead in Proper Direction	102,296	47.1
Merge with Traffic on Left	1,090	0.5
Merge with Traffic on Right	929	0.4
Left Turn	23,378	10.8
Right Turn	7,047	3.2
U Turn	472	0.2
Enter Roadway From Entrance Ramp on Left	162	0.1
Enter Roadway From Entrance Ramp on Right	595	0.3

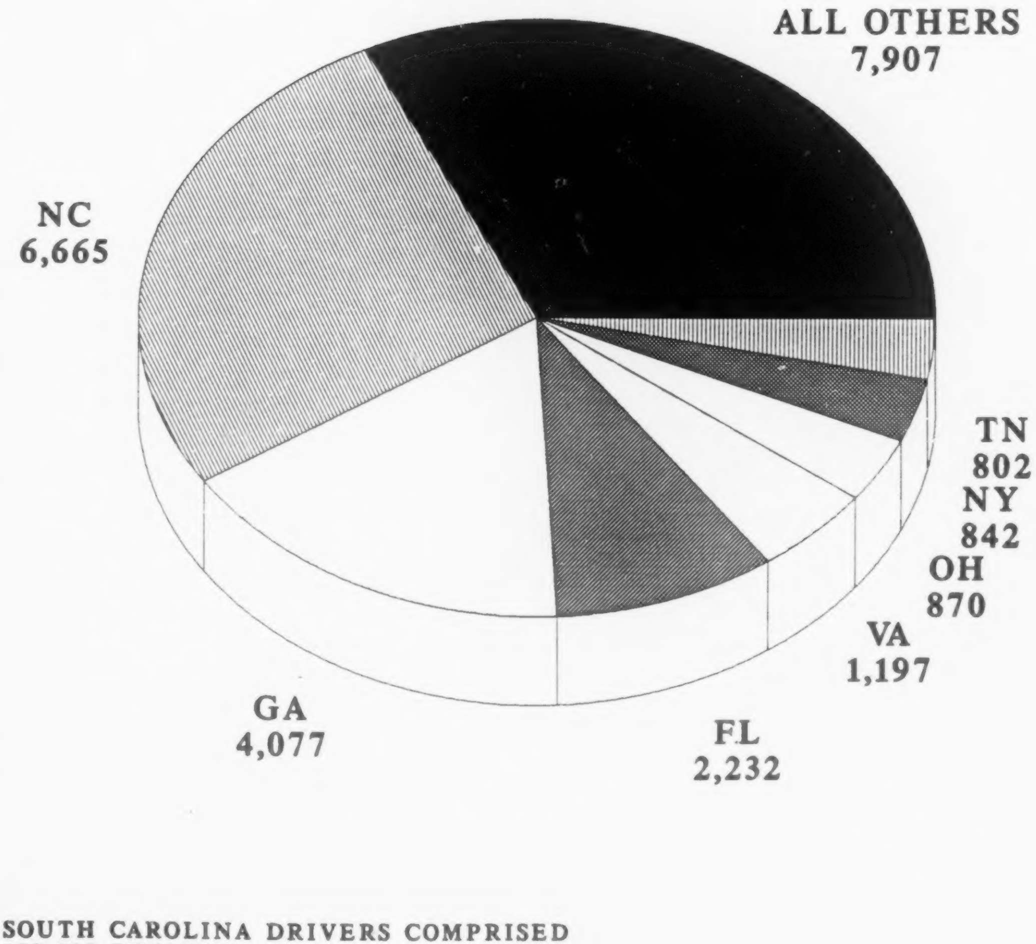
DRIVER INTENTIONS IN ALL ACCIDENTS

1990 (cont.)

INTENTION	Number	Percentage
TRAFFIC UNIT MANEUVER FOR OWN INTENDED MOVEMENT (cont.):		
Enter Roadway From Shoulder on Left	295	0.1
Enter Roadway From Shoulder on Right	933	0.4
Enter Roadway From Parking at Left Curb	115	0.1
Enter Roadway From Parking at Right Curb	391	0.2
Leave Roadway To Exit Ramp on Left	39	0.0
Leave Roadway To Exit Ramp on Right	153	0.1
Leave Roadway To Shoulder on Left	206	0.1
Leave Roadway To Shoulder on Right	365	0.2
Leave Roadway To Parking at Left Curb	46	0.0
Leave Roadway To Parking at Right Curb	142	0.1
Leave Roadway To Driveway on Left	447	0.2
Leave Roadway To Driveway on Right	339	0.2
Board or Discharge Passenger	226	0.1
Backing	4,270	2.0
TRAFFIC UNIT MANEUVER AROUND OTHER TRAFFIC UNIT(S):		
Overtaking Subject Unit on Left	1,947	0.9
Overtaking Subject Unit on Right	969	0.4
Changing Lanes to Left	2,058	0.9
Changing Lanes to Right	2,279	1.0
Merging From Left	165	0.1
Merging From Right	260	0.1
On Right Side of Roadway	255	0.1
In Wrong Direction on One Way Roadway	102	0.0
Swerving To Left	1,001	0.5
Swerving To Right	924	0.4
Slowing or Stopping	13,649	6.3
Stopped in Traffic	15,834	7.3
Stopped To Board or Discharge Passenger	331	0.2
Skidding, Spinning, or Yawing	1,670	0.8
Jack Knifing	27	0.0
Turning Left From Same Direction	645	0.3
Turning Left From Opposite Direction	585	0.3
Making U Turn	89	0.0
Turning Right From Same Direction	307	0.1
Turning Right From Opposite Direction	78	0.0
Entering Roadway From Ramp on Left	32	0.0
Entering Roadway From Ramp on Right	175	0.1
Entering Roadway From Roadway on Left	358	0.2
TOTAL	217,343	100.0

There are a total of eighty-one (81) categories of Driver Intentions that can be assigned to a driver involved in a traffic accident in South Carolina. In 1990, the top five categories accounted for more than three-fourths (77.6%) of all drivers involved in traffic accidents during the year. These include: "Moving Straight Ahead in Proper Direction" by 102,296 drivers or 47.1% of the total; followed by "Left Turn" with 23,378 (10.8%); "Stopped in Traffic", 15,834 (7.3%); "Slowing or Stopping", 13,649 (6.3%); and "No External Cause of Maneuver" with 13,259 (6.1%).

OUT OF STATE DRIVERS
IN SC TRAFFIC ACCIDENTS
1990



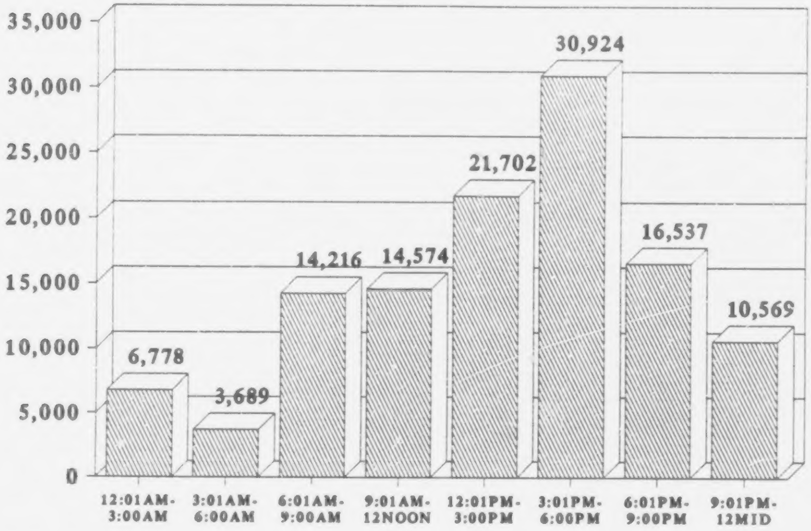
SOUTH CAROLINA DRIVERS COMPRISED
179,837 DRIVERS

B. Time

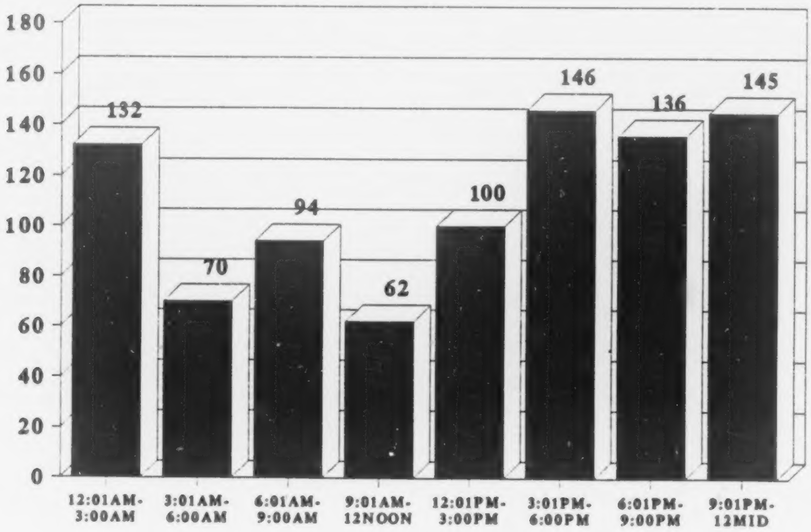
The frequency of traffic accidents is affected by the settings of the clock and calendar. The concentration of traffic, for example, is heavier at certain times of the day, days of the week and month. Travel is also affected by holidays and by special events such as football games. In addition to travel, driver attitudes, vision and behavior are influenced by these time factors. Also, the weather may be influenced by time of the year. On the following pages, statistics are presented which indicate observable differences in the occurrence of accidents with relation to various time variables. Some of the important observations in the 1990 data are as follows:

- Property damage only accidents are much more likely to occur during the daylight hours. More than 70% of accidents that have no injuries or fatalities occurred between 6:01am and 6:00pm.
- In contrast to the property damage only accidents, fatal accidents occurred more frequently in the nighttime hours between 6:01pm and 6:00am. More than 54 percent of all accidents involving fatalities occurred during this period.
- More traffic accidents were reported on Friday than on any other day of the week with of 19.7% of the total; the fewest traffic accidents were reported on Sundays with 9.7%.
- By far, the most fatal accidents were reported on Saturday, with 197 out of the 885 which occurred during the year. This represents more than 22% of all fatal accidents and is more than twice the number that occurred on Wednesday, the low day. Only 97 fatal accidents occurred on Wednesday, or 10.7% of the total.
- October was the leading month for all accidents in 1990. However, for the first time since 1984 fewer than 100 fatalities were reported for the month of October. More fatal accidents were reported in May than any other month in 1990 with 84, just ahead of the 83 reported in December.
- Traffic fatalities increased in 4 of the 6 holiday periods from 1989 to 1990 and decreased in the other two holiday periods. It should be noted that two of the holiday periods that increased (Christmas and New Years) were 24 hours longer in 1990 compared to 1989. Traffic fatalities decreased over the Thanksgiving holiday in 1990 to the lowest total in over a quarter of a century.

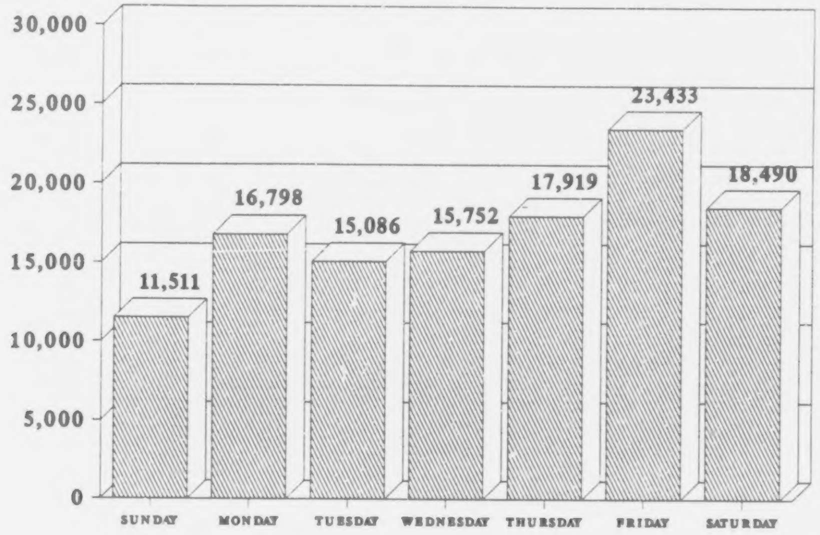
ALL ACCIDENTS BY TIME OF DAY
1990



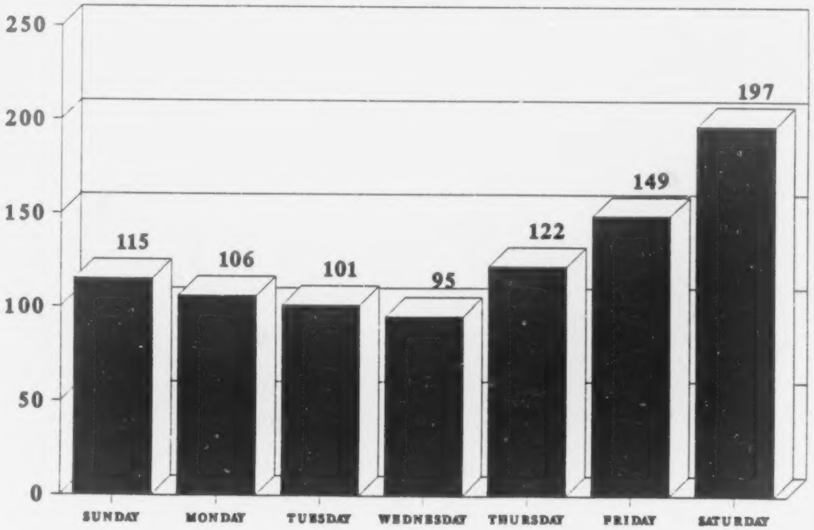
FATAL ACCIDENTS BY TIME OF DAY
1990



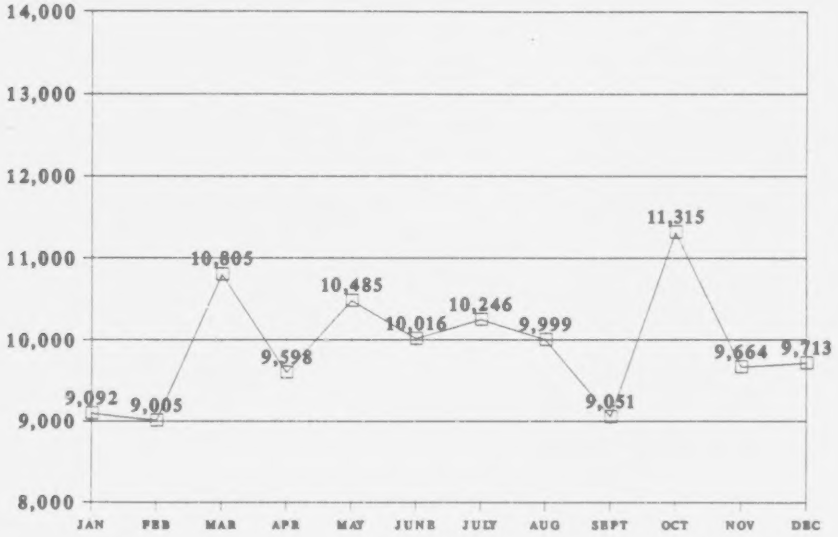
ALL ACCIDENTS BY DAY OF THE WEEK
1990



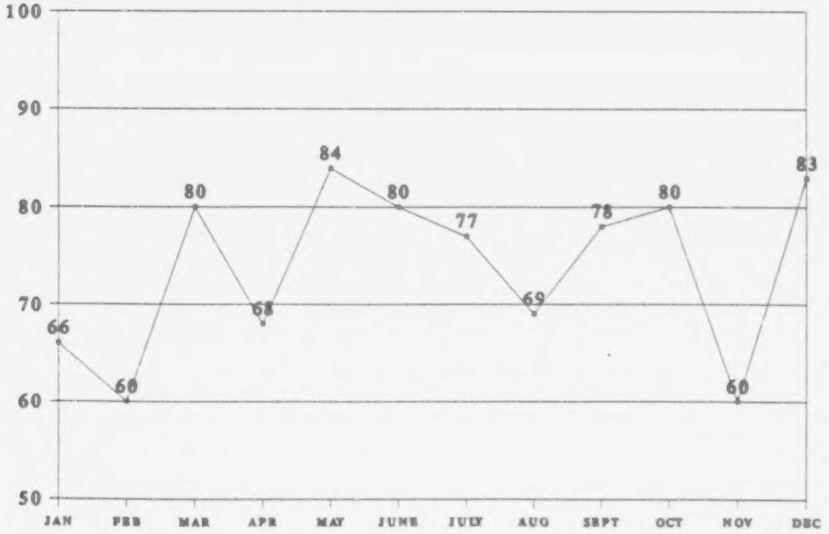
FATAL ACCIDENTS BY DAY OF THE WEEK
1990



ALL TRAFFIC ACCIDENTS BY MONTH
1990



FATAL TRAFFIC ACCIDENTS BY MONTH
1990



Traffic Accidents by Time of Day

The time of day had a substantial influence on the severity of traffic accidents which occurred during 1990. For all reported accidents, 68.4% occurred during the daylight hours, 6:01am to 6:00pm. However, only 45.4% of the fatal accidents occurred during this 12 hour period. The greatest number of accidents, both all and fatal, occurred during the afternoon rush hour, 3:01 to 6:00pm, but the percentages varied substantially. Exactly 26% of all accidents occurred during this three hour period. For fatal accidents the proportion was substantially smaller with only 16.5% occurring during this period.

The contrast between all and fatal accidents is even more apparent in the very early morning hours, between 12:01 and 6:00am. **More than twice** the percentage of fatal accidents (22.8%) occurred during these hours compared to all accidents (8.8%).

Traffic Accidents by Day of the Week

Differences in travel patterns and driver behavior between the seven days of the week are reflected in both the number and severity of traffic accidents which occurred in 1990. More accidents were reported on Friday than for any other day. Over 4,900 more accidents were reported on Friday than the second leading day, Saturday. A total of 20.5% of all accidents occurred on Friday. By contrast, the fewest accidents occurred on Sunday, with just 9.7% of the total.

The contrast between the days was even greater for fatal accidents. Far more fatal accidents were reported on Saturday than on any other day. The second leading day was Friday. The 197 reported fatal accidents on Saturday represented 22.3% of all fatal accidents; Friday's total of 149 represented 16.8%. Only 95 fatal accidents were reported on Wednesday, the day with the fewest fatal accidents. Less than half the number of fatal accidents were reported for Wednesday compared to Saturday.

Traffic Accidents by Month

The occurrence of traffic accidents differed substantially between the twelve months of 1990. The months of January, February and September each had more than 800 fewer accidents than the monthly average for the year (9,915). The peak month for all traffic accidents in 1990 was October with 11,315 reported accidents. In contrast to other years, there were no months with substantial icy weather conditions; as a result, all three winter months (January, February and December) had fewer accidents than the average month in 1990.

The month of May had the most fatal accidents of any month in 1990. The fewest fatal accidents were reported in February and November with 60 in each of those months. For the first time since 1984, fewer than 100 traffic fatalities were reported for the month of October. A total of 87 persons were killed in 80 fatal accidents during this month. An average month in 1990 had approximately 74 fatal accidents.

PERSONS KILLED AND FATAL ACCIDENTS FOR SELECTED HOLIDAY PERIODS IN SOUTH CAROLINA
1981 - 1990

Holiday & Years	Time Beginning	Days & Dates	Hours	Actual Holiday	Persons Killed	Fatal Accidents
Memorial Day						
1981	6 p.m.	05/22 - 05/25	78	Mon	12	11
1982	6 p.m.	05/28 - 05/31	78	Mon	5	5
1983	6 p.m.	05/27 - 05/30	78	Mon	7	6
1984	6 p.m.	05/25 - 05/28	78	Mon	5	5
1985	6 p.m.	05/24 - 05/27	78	Mon	12	10
1986	6 p.m.	05/23 - 05/26	78	Mon	17	14
1987	6 p.m.	05/22 - 05/25	78	Mon	10	8
1988	6 p.m.	05/27 - 05/30	78	Mon	10	8
1989	6 p.m.	05/26 - 05/29	78	Mon	13	9
1990	6 p.m.	05/25 - 05/28	78	Mon	12	10
Fourth of July						
1981	6 p.m.	07/02 - 07/05	78	Mon	13	12
1982	6 p.m.	07/02 - 07/05	78	Sun	8	7
1983	6 p.m.	07/01 - 07/04	78	Mon	17	13
1984	6 p.m.	07/03 - 07/04	30	Wed	3	2
1985	6 p.m.	07/03 - 07/07	102	Thru	20	18
1986	6 p.m.	07/03 - 07/05	78	Fri	17	17
1987	6 p.m.	07/02 - 07/05	78	Sat	13	13
1988	6 p.m.	07/01 - 07/04	78	Mon	16	15
1989	6 p.m.	06/30 - 07/04	102	Tue	16	14
1990	6 p.m.	07/03 - 07/04	30	Wed	9	9
Labor Day						
1981	6 p.m.	09/04 - 09/07	78	Mon	8	8
1982	6 p.m.	09/03 - 09/06	78	Mon	10	9
1983	6 p.m.	09/02 - 09/05	78	Mon	11	11
1984	6 p.m.	08/31 - 09/03	78	Mon	12	10
1985	6 p.m.	08/30 - 09/02	78	Mon	11	11
1986	6 p.m.	08/29 - 09/01	78	Mon	14	7
1987	6 p.m.	09/04 - 09/07	78	Mon	25	14
1988	6 p.m.	09/02 - 09/05	78	Mon	15	14
1989	6 p.m.	09/01 - 09/04	78	Mon	5	5
1990	6 p.m.	08/31 - 09/03	78	Mon	17	16

PERSONS KILLED AND FATAL ACCIDENTS FOR SELECTED HOLIDAY PERIODS IN SOUTH CAROLINA
1981 - 1990

Holiday & Years	Time Beginning	Days & Dates	Hours	Actual Holiday	Persons Killed	Fatal Accidents
Thanksgiving						
1981	6 p.m.	11/25 - 11/29	102	Thru	7	7
1982	6 p.m.	11/24 - 11/28	102	Thru	6	5
1983	6 p.m.	11/23 - 11/27	102	Thru	13	11
1984	6 p.m.	11/21 - 11/25	102	Thru	13	13
1985	6 p.m.	11/27 - 12/01	102	Thru	13	12
1986	6 p.m.	11/26 - 11/30	102	Thru	11	12
1987	6 p.m.	11/25 - 11/29	102	Thru	19	15
1988	6 p.m.	11/23 - 11/27	102	Thru	20	13
1989	6 p.m.	11/22 - 11/26	102	Thru	15	14
1990	6 p.m.	11/22 - 11/26	102	Thru	6	6
Christmas						
1981	6 p.m.	12/24 - 12/27	78	Fri	13	10
1982	6 p.m.	12/23 - 12/26	78	Sat	8	8
1983	6 p.m.	12/23 - 12/26	78	Sun	10	9
1984	6 p.m.	12/21 - 12/25	102	Tue	20	19
1985	6 p.m.	12/24 - 12/25	30	Wed	6	4
1986	6 p.m.	12/24 - 12/28	102	Thru	16	15
1987	6 p.m.	12/24 - 12/27	78	Fri	10	10
1988	6 p.m.	12/23 - 12/26	78	Sun	4	4
1989	6 p.m.	12/22 - 12/25	78	Mon	10	10
1990	6 p.m.	12/21 - 12/25	102	Tue	23	19
New Years						
1981	6 p.m.	12/31/81 - 01/03/82	78	Fri	8	8
1982	6 p.m.	12/30/82 - 01/02/83	78	Sat	8	8
1983	6 p.m.	12/30/83 - 01/02/84	78	Sun	8	8
1984	6 p.m.	12/28/84 - 01/01/85	102	Tue	12	10
1985	6 p.m.	12/31/85 - 01/01/86	30	Wed	4	4
1986	6 p.m.	12/31/86 - 01/04/87	102	Thru	27	20
1987	6 p.m.	12/31/87 - 01/03/88	78	Fri	6	6
1988	6 p.m.	12/30/88 - 01/02/89	78	Sun	14	12
1989	6 p.m.	12/29/89 - 01/01/90	78	Mon	10	10
1990	6 p.m.	12/28/90 - 01/01/91	102	Tue	14	13

SOUTH CAROLINA
MOTOR VEHICLE TRAFFIC DEATH CALENDAR
1990

JANUARY							
	SUN	MON	TUE	WED	THUR	FRI	SAT
		1 2	2 1	3 0	4 2	5 1	6 3
	7 5	8 0	9 2	10 0	11 3	12 3	13 1
	14 3	15 2	16 3	17 2	18 1	19 2	20 2
	21 1	22 2	23 0	24 3	25 8	26 2	27 3
	28 5	29 3	30 1	31 6			
Total	14	9	7	11	14	8	9

Monthly Total 72

FEBRUARY							
	SUN	MON	TUE	WED	THUR	FRI	SAT
					1 1	2 3	3 3
	4 2	5 0	6 0	7 2	8 1	9 3	10 8
	11 2	12 2	13 2	14 0	15 1	16 4	17 6
	18 3	19 2	20 2	21 0	22 3	23 4	24 2
	25 0	26 3	27 2	28 2			
Total	7	7	6	4	6	14	19

Monthly Total 63

MARCH							
	SUN	MON	TUE	WED	THUR	FRI	SAT
					1 0	2 2	3 10
	4 2	5 3	6 1	7 3	8 1	9 3	10 4
	11 1	12 1	13 0	14 6	15 3	16 5	17 5
	18 4	19 3	20 4	21 0	22 4	23 6	24 5
	25 3	26 1	27 1	28 1	29 6	30 5	31 3
Total	10	8	6	10	14	21	27

Monthly Total 96

APRIL							
	SUN	MON	TUE	WED	THUR	FRI	SAT
	1 1	2 0	3 2	4 4	5 2	6 4	7 5
	8 0	9 4	10 1	11 2	12 3	13 4	14 2
	15 0	16 2	17 4	18 1	19 1	20 4	21 3
	22 4	23 2	24 2	25 2	26 2	27 7	28 8
	29 1	30 0					
Total	6	8	9	9	8	19	18

Monthly Total 77

MAY							
	SUN	MON	TUE	WED	THUR	FRI	SAT
			1 1	2 1	3 3	4 3	5 5
	6 2	7 2	8 2	9 3	10 4	11 3	12 3
	13 5	14 2	15 2	16 1	17 3	18 1	19 7
	20 9	21 4	22 5	23 0	24 3	25 5	26 6
	27 1	28 1	29 2	30 0	31 5		
Total	17	9	12	5	18	12	21

Monthly Total 94

JUNE							
	SUN	MON	TUE	WED	THUR	FRI	SAT
						1 5	2 4
	3 2	4 6	5 3	6 3	7 4	8 5	9 11
	10 4	11 1	12 4	13 1	14 1	15 1	16 1
	17 1	18 3	19 1	20 1	21 2	22 3	23 5
	24 1	25 4	26 1	27 3	28 2	29 2	30 3
Total	8	14	9	8	9	16	24

Monthly Total 88

SOUTH CAROLINA
MOTOR VEHICLE TRAFFIC DEATH CALENDAR
1990

	JULY						
	SUN	MON	TUE	WED	THUR	FRI	SAT
	1 4	2 0	3 4	4 7	5 1	6 0	7 4
	8 1	9 3	10 3	11 4	12 2	13 3	14 3
	15 3	16 2	17 1	18 2	19 3	20 2	21 8
	22 5	23 3	24 1	25 0	26 0	27 2	28 5
	29 3	30 2	31 2				
Total	16	10	11	13	6	7	20

Monthly Total 83

	AUGUST						
	SUN	MON	TUE	WED	THUR	FRI	SAT
				1 4	2 0	3 0	4 3
	5 2	6 3	7 0	8 3	9 1	10 0	11 3
	12 5	13 2	14 3	15 2	16 5	17 5	18 3
	19 1	20 5	21 4	22 2	23 1	24 3	25 4
	26 3	27 3	28 1	29 1	30 2	31 5	
Total	11	13	8	12	9	13	13

Monthly Total 79

	SEPTEMBER						
	SUN	MON	TUE	WED	THUR	FRI	SAT
							1 7
	2 3	3 5	4 2	5 1	6 2	7 4	8 7
	9 2	10 2	11 4	12 3	13 4	14 10	15 5
	16 3	17 0	18 6	19 0	20 1	21 1	22 5
	23 1	24 0	25 2	26 2	27 3	28 0	29 2
	30 3						
Total	12	7	14	6	10	15	26

Monthly Total 90

	OCTOBER						
	SUN	MON	TUE	WED	THUR	FRI	SAT
		1 5	2 2	3 5	4 4	5 4	6 3
	7 1	8 2	9 0	10 5	11 4	12 1	13 6
	14 3	15 0	16 4	17 3	18 4	19 3	20 2
	21 3	22 0	23 2	24 1	25 4	26 6	27 3
	28 2	29 2	30 1	31 2			
Total	9	9	9	16	16	14	14

Monthly Total 87

	NOVEMBER						
	SUN	MON	TUE	WED	THUR	FRI	SAT
					1 2	2 3	3 3
	4 0	5 3	6 7	7 1	8 0	9 2	10 2
	11 3	12 4	13 1	14 0	15 3	16 7	17 3
	18 3	19 3	20 2	21 1	22 1	23 2	24 2
	25 0	26 2	27 1	28 1	29 2	30 1	
Total	6	12	11	3	8	15	10

Monthly Total 65

	DECEMBER						
	SUN	MON	TUE	WED	THUR	FRI	SAT
							1 2
	2 0	3 2	4 0	5 3	6 5	7 1	8 3
	9 2	10 1	11 3	12 5	13 6	14 3	15 6
	16 2	17 1	18 2	19 1	20 2	21 7	22 5
	23 5	24 5	25 4	26 0	27 1	28 1	29 3
	30 7	31 1					
Total	16	10	9	9	14	12	19

Monthly Total 89

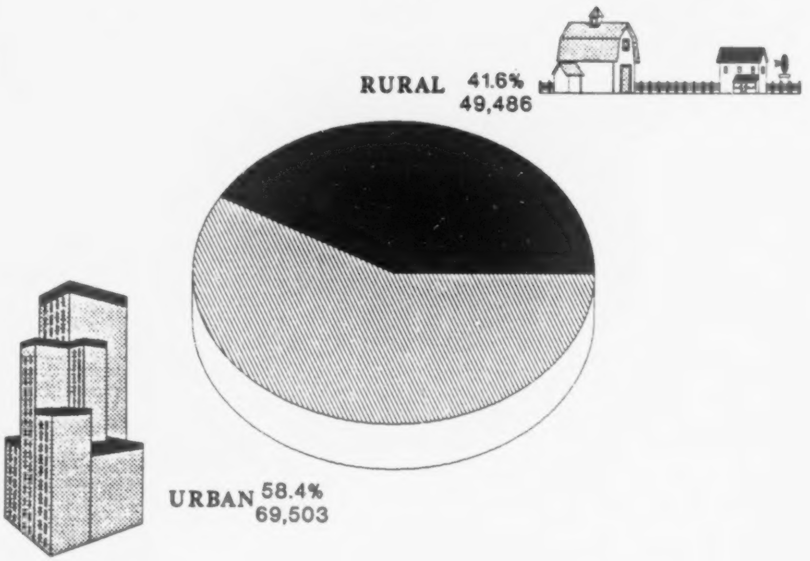
C. Location

No area of South Carolina was immune from traffic accidents in 1990. Every county experienced the tragedy of at least three fatal traffic accidents during the year. Eight of the state's 46 counties had at least 40 traffic fatalities during the year. A variety of factors influence where traffic accidents, injuries and fatalities occur including the volume of traffic on a particular highway, weather variations, travel patterns and many other factors. On the following pages, statistics are presented which indicate observable differences in the occurrence of traffic accidents with relation to various location categories. Some of the important observations in the data are as follows:

- In 1990, the most traffic accidents occurred in Charleston County with 14,019. The most fatal accidents were in Greenville Count with 75.
- A total of 63,685 accidents were investigated by the South Carolina Highway Patrol. This represents 53.5% of the total.
- More accidents occured on US Primary routes than on any other route category. These routes accounted for 32.6% of all reported accidents.
- The secondary routes accounted for the largest percentage of fatal accidents with 34.4% of the total. The 304 fatal accidents which occurred on the secondary routes were nearly 5 times the 63 fatal accidents reported on the Interstates.
- A total of 6,472 accidents occurred on the Interstates. This was approximately 1/6 of the total reported for US Primary routes.
- A total of 45.9% of all reported traffic accidents in 1990 occurred at a "nonjunction" location. The 438 fatal accidents at a "nonjunction" location represent slightly less than half of all fatal traffic accidents for the year. (See definitions page for a definition of "nonjunction".)

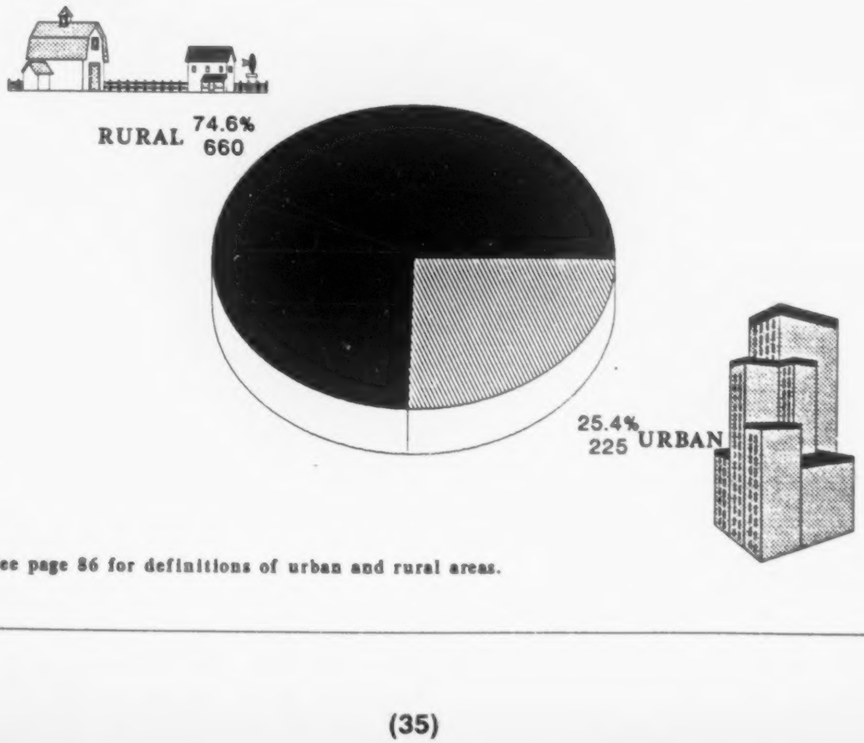
ALL TRAFFIC ACCIDENTS: RURAL/URBAN*

1990



FATAL TRAFFIC ACCIDENTS: RURAL/URBAN*

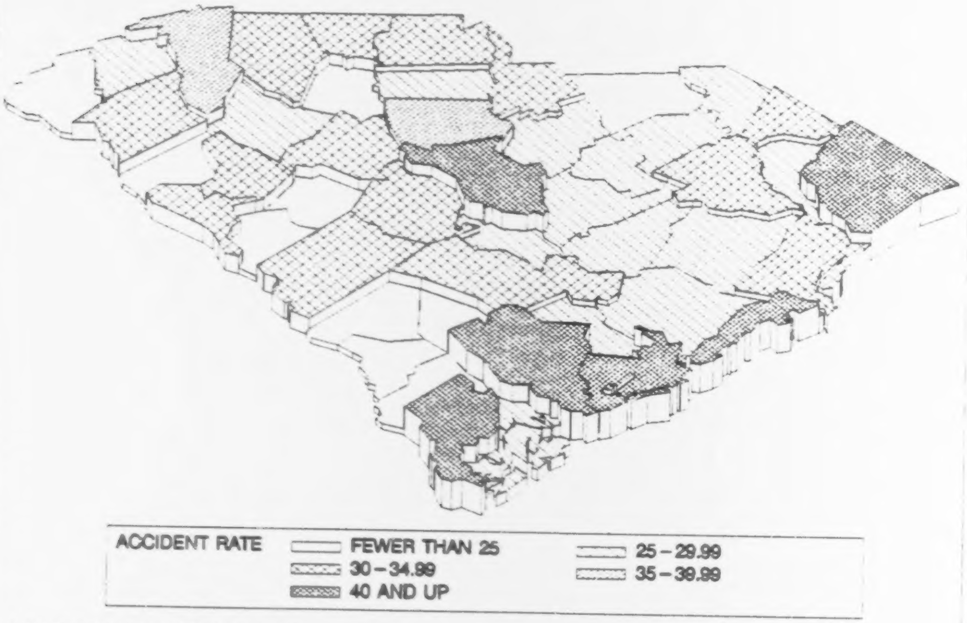
1990



* See page 86 for definitions of urban and rural areas.

TRAFFIC ACCIDENTS PER 1000 POPULATION*

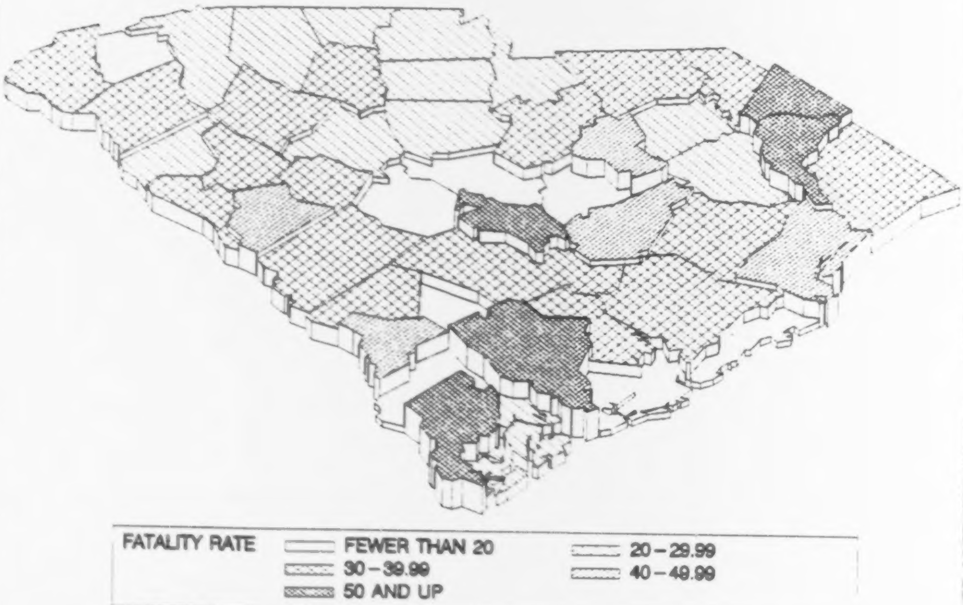
1990



* BASED ON 1990 CENSUS DATA

TRAFFIC FATALITIES PER 100,000 POPULATION*

1990



*BASED ON 1990 CENSUS DATA

SOUTH CAROLINA TRAFFIC ACCIDENT DEATHS
BY HIGHWAY DISTRICT
1989 vs. 1990

DISTRICT #1

COUNTY	DEATHS	
	1989	1990
Aiken	37	47
Kershaw	14	15
Lee	9	8
Lexington	36	28
Richland	45	49
Sumter	29	19
Total	170	166

DISTRICT #2

COUNTY	DEATHS	
	1989	1990
Abbeville	7	5
Edgefield	6	8
Greenwood	13	19
Laurens	11	19
McCormick	1	3
Newberry	4	7
Saluda	6	6
Total	48	67

DISTRICT #3

COUNTY	DEATHS	
	1989	1990
Anderson	40	47
Greenville	80	78
Oconee	22	20
Pickens	21	18
Spartanburg	62	54
Total	225	217

DISTRICT #4

COUNTY	DEATHS	
	1989	1990
Cherokee	20	12
Chester	15	9
Chesterfield	18	12
Fairfield	7	6
Lancaster	23	14
Union	6	10
York	30	34
Total	119	97

DISTRICT #5

COUNTY	DEATHS	
	1989	1990
Darlington	42	18
Dillon	25	16
Florence	27	25
Georgetown	15	20
Horry	40	49
Marion	11	17
Marlboro	14	11
Williamsburg	26	14
Total	200	170

DISTRICT #6

COUNTY	DEATHS	
	1989	1990
Beaufort	17	21
Berkeley	27	41
Charleston	45	51
Colleton	10	36
Dorchester	23	27
Jasper	14	18
Total	136	194

DISTRICT #7

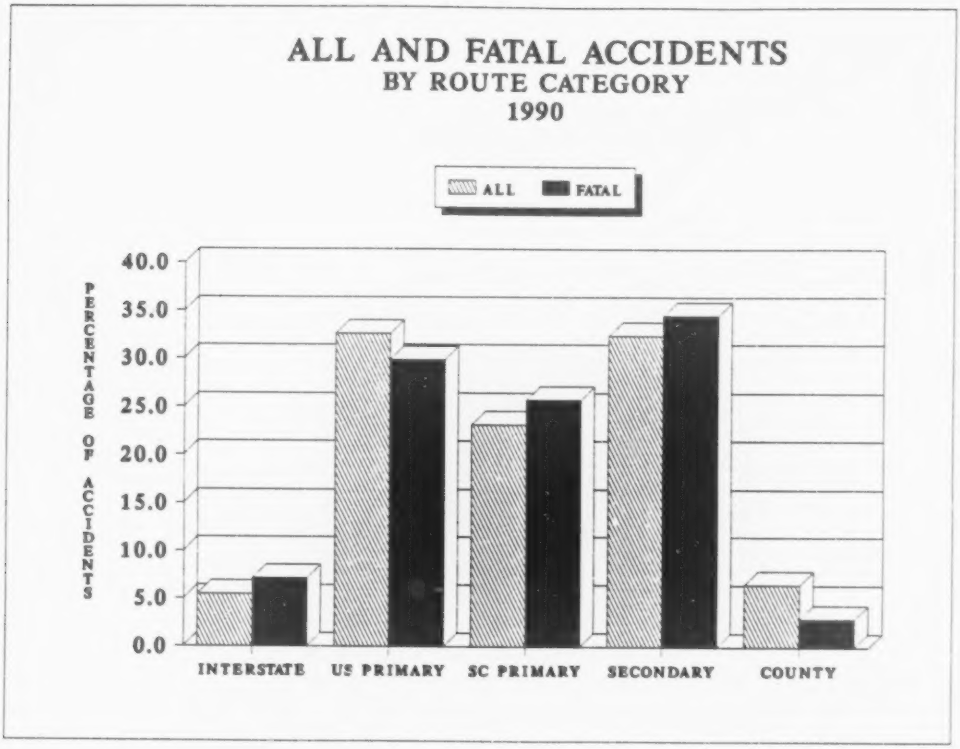
COUNTY	DEATHS	
	1989	1990
Allendale	4	5
Bamberg	17	3
Barnwell	3	7
Calhoun	4	15
Clarendon	20	13
Hampton	10	3
Orangeburg	40	26
Total	98	72

STATE TOTALS

DISTRICT	YEAR	
	1989	1990
District #1	170	166
District #2	48	67
District #3	225	217
District #4	119	97
District #5	200	170
District #6	136	194
District #7	98	72
TOTAL	996	983

SOUTH CAROLINA
MOTOR VEHICLE TRAFFIC ACCIDENTS BY COUNTY - 1990

COUNTY	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
Abbeville	5	127	348	480	5	211
Aiken	44	972	2,902	3,918	47	1,600
Allendale	5	82	142	229	5	163
Anderson	41	1,193	3,320	4,554	47	1,904
Bamberg	3	103	250	356	3	169
Barnwell	4	118	291	413	7	181
Beaufort	19	473	1,844	2,336	21	735
Berkeley	37	767	2,788	3,592	41	1,187
Calhoun	12	84	256	352	15	144
Charleston	47	3,384	10,588	14,019	51	5,184
Cherokee	12	423	1,007	1,442	12	721
Chester	9	304	632	945	9	517
Chesterfield	12	283	584	879	12	486
Clarendon	10	215	524	749	13	356
Colleton	30	316	1,135	1,481	36	561
Darlington	17	605	1,032	1,654	18	1,058
Dillon	15	309	689	1,013	16	641
Dorchester	24	525	1,791	2,340	27	833
Edgefield	8	134	240	382	8	210
Fairfield	6	201	591	798	6	346
Florence	22	1,148	2,772	3,942	25	1,931
Georgetown	17	402	987	1,406	20	711
Greenville	75	2,800	9,728	12,603	78	4,339
Greenwood	17	544	1,497	2,058	19	865
Hampton	3	57	333	393	3	84
Horry	43	1,731	4,896	6,670	49	3,048
Jasper	18	138	533	689	18	219
Kershaw	13	292	919	1,224	15	465
Lancaster	11	518	1,171	1,700	14	832
Laurens	16	473	1,158	1,647	19	780
Lee	5	172	287	464	8	280
Lexington	24	1,321	4,364	5,709	28	2,159
McCormick	3	56	215	274	3	86
Marion	13	298	616	927	17	516
Marlboro	10	262	474	746	11	476
Newberry	7	216	808	1,031	7	358
Oconee	18	363	1,034	1,415	20	583
Orangeburg	25	636	2,050	2,711	26	1,026
Pickens	16	639	1,698	2,353	18	944
Richland	46	2,485	9,620	12,151	49	3,830
Saluda	4	121	269	394	6	198
Spartanburg	52	2,137	5,687	7,876	54	3,523
Sumter	18	595	2,094	2,707	19	1,005
Union	7	230	510	747	10	369
Williamsburg	13	290	618	921	14	549
York	29	1,234	3,036	4,299	34	1,954
Total	**885**	**29,776**	**88,328**	**118,989**	**983**	**48,337**



ALL AND FATAL ACCIDENTS
BY ROUTE CATEGORY
1990

A total of 38,754 traffic accidents were reported on US Primary routes during 1990. This was the most for any of the five route category classifications, and accounted for 32.6% of all reported accidents. The South Carolina secondary routes were a close second, accounting for 38,482 (32.3%) of the reported accident total. The fewest reported accidents were on the Interstate highways. A total of 6,472 accidents were reported for these routes. This was just slightly more than 1/6 of the total reported for US Primary routes.

The proportion of fatal accidents occurring on the Secondary routes is even higher than for all accidents. The 304 fatal accidents which occurred on these routes accounted for 34.4% of the 885 fatal accidents reported in 1990. On the US and SC Primary routes, 264 and 227 fatal accidents respectively were reported during the year. The fewest fatal accidents occurred on the County routes with 26 (2.9%). A total of 63 (7.1%) fatal accidents were reported for the Interstates. This was just over 1/5 the total reported for the Secondary routes and is slightly less than the 65 fatal Interstate accidents reported in 1989.

TRAFFIC ACCIDENTS INVESTIGATED BY JURISDICTION
1990

	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
JURISDICTION	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
S.C. HWY PATROL DIST. 1	135	3,164	11,419	14,718	150	5,065
S.C. HWY PATROL DIST. 2	53	1,025	2,887	3,965	60	1,617
S.C. HWY PATROL DIST. 3	175	4,074	12,740	16,989	188	6,424
S.C. HWY PATROL DIST. 4	74	1,882	4,510	6,466	84	3,070
S.C. HWY PATROL DIST. 5	123	2,803	6,718	9,644	138	4,906
S.C. HWY PATROL DIST. 6	122	1,583	6,877	8,582	136	2,475
S.C. HWY PATROL DIST. 7	55	748	2,524	3,327	65	1,171
ABBEVILLE POLICE DEPT.	0	38	108	146	0	71
AIKEN COUNTY SHERIFF	1	26	80	107	1	37
AIKEN POLICE DEPT.	2	240	746	988	2	396
ALLENDALE COUNTY SHERIFF	0	1	0	1	0	5
ALLENDALE POLICE DEPT.	1	38	45	84	1	88
ANDERSON COUNTY SHERIFF	0	2	1	3	0	2
ANDERSON POLICE DEPT.	5	281	781	1,067	5	468
ANDREWS POLICE DEPT.	1	25	61	87	2	37
ATLANTIC BEACH POLICE DEPT.	1	14	42	57	1	39
AYNOR POLICE DEPT.	1	4	31	36	2	8
BAMBERG COUNTY SHERIFF	0	0	1	1	0	0
BAMBERG POLICE DEPT.	0	34	37	71	0	57
BARNWELL POLICE DEPT.	0	54	91	145	0	88
BATESBURG POLICE DEPT.	0	43	72	115	0	77
BEAUFORT COUNTY SHERIFF	0	94	354	448	0	143
BEAUFORT POLICE DEPT.	0	120	362	482	0	158
BELTON POLICE DEPT.	0	39	63	102	0	53
BENNETTSVILLE POLICE DEPT.	0	56	116	172	0	110
BERKELEY COUNTY SHERIFF	0	3	0	3	0	3
BETHUNE POLICE DEPT.	0	2	4	6	0	2
BISHOPVILLE POLICE DEPT.	0	35	33	68	0	68
BLACKSBURG POLICE DEPT.	0	10	30	40	0	18
BLACKVILLE POLICE DEPT.	1	20	26	47	1	30
BLUFFTON POLICE DEPT.	0	2	3	5	0	2
BONNEAU POLICE DEPT.	0	8	1	9	0	19
BOWMAN POLICE DEPT.	0	0	2	2	0	0
BRANCHVILLE POLICE DEPT.	0	1	15	16	0	1
BRUNSON POLICE DEPT.	0	1	4	5	0	1
CALHOUN FALLS POLICE DEPT.	0	4	13	17	0	8
CAMDEN POLICE DEPT.	0	69	181	250	0	125
CAMERON POLICE DEPT.	0	1	0	1	0	1
CAMPOBELLO POLICE DEPT.	0	0	2	2	0	0
CAYCE POLICE DEPT.	1	123	324	448	1	206
PAGE TOTAL	751	16,667	51,304	68,722	837	27,049

TRAFFIC ACCIDENTS INVESTIGATED BY JURISDICTION
1990 (cont.)

JURISDICTION	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
CENTRAL POLICE DEPT.	0	7	28	35	0	11
CHAPIN POLICE DEPT.	0	2	14	16	0	5
CHARLESTON AVIATION AUTH.	0	3	4	7	0	5
CHARLESTON COUNTY SHERIFF	0	3	5	8	0	3
CHARLESTON COUNTY POLICE	26	1,064	2,235	3,325	30	1,719
CHARLESTON POLICE DEPT.	5	866	3,216	4,087	5	1,315
CHERAW POLICE DEPT	0	64	121	185	0	114
CHESNEE POLICE DEPT.	0	19	44	63	0	27
CHESTER COUNTY SHERIFF	0	0	1	1	0	0
CHESTER POLICE DEPT.	0	47	121	168	0	82
CHESTERFIELD POLICE DEPT.	0	12	24	36	0	23
CITY VIEW POLICE DEPT.	0	3	6	9	0	3
CLARENDON COUNTY SHERIFF	1	0	10	11	1	0
CLEMSON POLICE DEPT.	1	79	262	342	1	119
CLEMSON UNIVERSITY POLICE	0	31	99	130	0	42
CLINTON POLICE DEPT.	0	74	154	228	0	135
CLOVER POLICE DEPT.	0	25	70	95	0	37
COLLETON COUNTY SHERIFF	0	2	2	4	0	6
COLUMBIA METRO. AIRPORT PD.	0	3	6	9	0	5
COLUMBIA POLICE DEPT.	4	1,214	4,577	5,795	5	1,832
CONWAY POLICE DEPT.	2	132	403	537	2	232
COTTAGEVILLE POLICE DEPT.	0	0	3	3	0	0
COWARD POLICE DEPT.	0	0	1	1	0	0
COWPENS POLICE DEPT.	0	11	22	33	0	22
CROSS HILL POLICE DEPT.	0	2	2	4	0	3
DARLINGTON POLICE DEPT.	2	65	164	231	2	113
DENMARK POLICE DEPT.	1	21	35	57	1	38
DILLON POLICE DEPT.	2	93	234	329	2	174
DORCHESTER COUNTY SHERIFF	0	2	15	17	0	2
DUE WEST POLICE DEPT.	0	1	5	6	0	2
DUNCAN POLICE DEPT.	0	15	36	51	0	15
EASLEY POLICE DEPT.	1	151	466	618	1	223
EASTOVER POLICE DEPT.	0	2	8	10	0	3
EDGEFIELD COUNTY SHERIFF	0	5	2	7	0	8
EDGEFIELD POLICE DEPT.	0	20	37	57	0	28
EDISTO BEACH POLICE DEPT.	0	1	5	6	0	1
ELGIN POLICE DEPT.	0	2	7	9	0	2
ELLOREE POLICE DEPT.	0	3	19	22	0	5
ENOREE POLICE DEPT.	0	0	1	1	0	0
ESTILL POLICE DEPT.	0	7	21	28	0	13
PAGE TOTAL	45	4,051	12,485	16,581	50	6,367

TRAFFIC ACCIDENTS INVESTIGATED BY JURISDICTION
1990 (cont.)

JURISDICTION	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
EUTAWVILLE POLICE DEPT.	1	0	8	9	1	0
FAIRFAX POLICE DEPT.	0	6	17	23	0	13
FAIRFIELD COUNTY SHERIFF	0	0	2	2	0	0
FLORENCE COUNTY SHERIFF	0	1	1	2	0	1
FLORENCE POLICE DEPT.	4	515	1,114	1,633	4	860
FOLLY BEACH POLICE DEPT.	0	8	43	51	0	11
FOREST ACRES POLICE DEPT.	0	66	228	294	0	100
FORT LAWN POLICE DEPT.	0	0	1	1	0	0
FORT MILL POLICE DEPT.	0	30	70	100	0	43
FOUNTAIN INN POLICE DEPT.	0	31	78	109	0	53
GAFFNEY POLICE DEPT.	3	168	344	515	3	279
GASTON POLICE DEPT.	0	0	1	1	0	0
GEORGETOWN COUNTY SHERIFF	0	28	40	68	0	49
GEORGETOWN POLICE DEPT.	1	148	313	462	1	282
GIFFORD POLICE DEPT.	0	0	1	1	0	0
GOOSE CREEK POLICE DEPT.	1	132	446	579	1	194
GRAY COURT POLICE DEPT.	1	4	8	13	1	5
GREAT FALLS POLICE DEPT.	0	27	39	66	0	44
GREENVILLE COUNTY SHERIFF	0	10	19	29	0	16
GREENVILLE POLICE DEPT.	10	921	3,343	4,274	11	1,398
GRNVILLE/SPRTBRG AIRPORT PD.	0	0	1	1	0	0
GREENWOOD COUNTY SHERIFF	0	0	1	1	0	0
GREENWOOD POLICE DEPT.	2	219	622	843	2	347
GREER POLICE DEPT.	1	161	327	489	1	252
HAMPTON COUNTY SHERIFF	0	2	3	5	0	4
HAMPTON POLICE DEPT.	0	18	72	90	0	25
HANAHAN POLICE DEPT.	2	59	123	184	3	84
HARDEVILLE POLICE DEPT.	2	10	33	45	2	15
HARLEYVILLE POLICE DEPT.	0	0	5	5	0	0
HARTSVILLE POLICE DEPT.	1	94	237	332	1	156
HEATH SPRINGS POLICE DEPT.	0	0	5	5	0	0
HEMINGWAY POLICE DEPT.	0	11	32	43	0	19
HOLLY HILL POLICE DEPT.	0	19	43	62	0	33
HONEA PATH POLICE DEPT.	0	21	70	91	0	27
HORRY COUNTY SHERIFF	0	2	0	2	0	12
INMAN POLICE DEPT.	0	14	38	52	0	21
IRMO POLICE DEPT.	0	42	155	197	0	63
ISLE OF PALMS POLICE DEPT.	0	6	40	46	0	8
IVA POLICE DEPT.	0	4	14	18	0	4
JACKSON POLICE DEPT.	0	14	24	38	0	38
PAGE TOTAL	29	2,791	7,961	10,781	31	4,456

TRAFFIC ACCIDENTS INVESTIGATED BY JURISDICTION
1990 (cont.)

JURISDICTION	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
JAMESTOWN POLICE DEPT.	0	1	2	3	0	12
JEFFERSON POLICE DEPT.	0	1	0	1	0	1
JOHNSONVILLE POLICE DEPT.	0	6	23	29	0	9
JOHNSTON POLICE DEPT.	2	12	27	41	2	22
JONESVILLE POLICE DEPT.	1	1	22	24	1	1
KERSHAW COUNTY SHERIFF	0	2	1	3	0	2
KERSHAW POLICE DEPT.	0	16	32	48	0	26
KINGSTREE POLICE DEPT.	1	48	126	175	1	101
LAKE CITY POLICE DEPT.	0	77	153	230	0	126
LAKEVIEW POLICE DEPT.	0	4	18	22	0	14
LAMAR POLICE DEPT.	0	5	15	20	0	13
LANCASTER COUNTY SHERIFF	0	0	3	3	0	0
LANCASTER POLICE DEPT.	0	134	296	430	0	225
LANDRUM POLICE DEPT.	0	16	33	49	0	33
LATTA POLICE DEPT.	0	23	33	56	0	59
LAURENS COUNTY SHERIFF	0	1	0	1	0	1
LAURENS POLICE DEPT.	1	112	263	376	1	182
LEESVILLE POLICE DEPT.	0	5	18	23	0	10
LEXINGTON COUNTY SHERIFF	0	24	64	88	0	33
LEXINGTON POLICE DEPT.	0	64	225	289	0	106
LIBERTY POLICE DEPT.	0	30	68	98	0	46
LINCOLNVILLE POLICE DEPT.	0	2	3	5	0	4
LORIS POLICE DEPT.	0	23	61	84	0	66
LYMAN POLICE DEPT.	0	23	37	60	0	35
LYNCHBURG POLICE DEPT.	0	5	3	8	0	5
MANNING POLICE DEPT.	0	50	94	144	0	91
MARION COUNTY SHERIFF	0	2	0	2	0	6
MARION POLICE DEPT.	0	62	101	163	0	98
MAULDIN POLICE DEPT.	2	102	251	355	2	164
MAYESVILLE POLICE DEPT.	0	1	1	2	0	4
MCBEE POLICE DEPT.	1	4	8	13	1	8
MCCOLL POLICE DEPT.	0	8	17	25	0	10
MCCORMICK POLICE DEPT.	0	18	56	74	0	28
MONCKS CORNER POLICE DEPT.	0	88	184	272	0	160
MT. PLEASANT POLICE DEPT.	2	269	934	1,205	2	411
MULLINS POLICE DEPT.	2	41	111	154	4	71
MYRTLE BEACH POLICE DEPT.	7	475	1,208	1,690	8	842
NEW ELLENTON POLICE DEPT.	0	10	15	25	0	17
NEWBERRY POLICE DEPT.	1	69	210	280	1	145
NICHOLS POLICE DEPT.	0	4	6	10	0	5
PAGE TOTAL	20	1,838	4,722	6,580	23	3,192

TRAFFIC ACCIDENTS INVESTIGATED BY JURISDICTION
1990 (cont.)

	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
JURISDICTION	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
NINETY SIX POLICE DEPT.	0	8	14	22	0	12
NORTH POLICE DEPT.	0	0	5	5	0	0
NORTH AUGUSTA POLICE DEPT.	2	158	474	634	2	254
NORTH CHARLESTON PD.	9	902	2,823	3,734	9	1,339
NORTH MYRTLE BEACH PD.	2	208	497	707	2	397
NORWAY POLICE DEPT.	0	0	1	1	0	0
OLANTA POLICE DEPT.	0	1	1	2	0	1
OLAR POLICE DEPT.	0	0	3	3	0	0
ORANGEBURG COUNTY SHERIFF	0	0	2	2	0	0
ORANGEBURG POLICE DEPT.	1	213	620	834	1	364
PACOLET POLICE DEPT.	0	15	20	35	0	22
PACOLET MILLS POLICE DEPT.	0	0	1	1	0	0
PAGELAND POLICE DEPT.	0	27	63	90	0	40
PELION POLICE DEPT.	0	1	2	3	0	2
PELZER POLICE DEPT.	0	0	2	2	0	0
PENDELETON POLICE DEPT.	0	19	50	69	0	31
PICKENS COUNTY SHERIFF	0	1	1	2	0	1
PICKENS POLICE DEPT.	0	28	109	137	0	40
PINE RIDGE POLICE DEPT.	0	5	5	10	0	9
PINEWOOD POLICE DEPT.	0	0	5	5	0	0
PORT ROYAL POLICE DEPT.	0	29	55	84	0	50
PROSPERITY POLICE DEPT.	0	8	15	23	0	10
QUINBY POLICE DEPT.	0	3	7	10	0	6
RICHLAND COUNTY SHERIFF	0	3	17	20	0	4
RIDGE SPRING POLICE DEPT.	0	4	4	8	0	6
RIDGELAND POLICE DEPT.	0	18	24	42	0	25
RIDGEVILLE POLICE DEPT.	0	0	2	2	0	0
RIDGEWAY POLICE DEPT.	0	3	8	11	0	8
ROCK HILL POLICE DEPT.	6	545	1,298	1,849	6	880
S.C. PORTS AUTHORITY	0	0	1	1	0	0
SALLEY POLICE DEPT.	0	2	4	6	0	2
SALUDA COUNTY SHERIFF	0	0	1	1	0	0
SALUDA POLICE DEPT.	0	16	54	70	0	26
SANTEE POLICE DEPT.	0	7	14	21	0	9
SELLERS POLICE DEPT.	0	0	1	1	0	0
SENECA POLICE DEPT.	1	68	238	307	1	110
SIMPSONVILLE POLICE DEPT.	0	97	161	258	0	181
SOCIETY HILL POLICE DEPT.	0	5	5	10	0	7
SOUTH CONGAREE POLICE DEPT.	2	14	26	42	2	28
SPARTANBURG COUNTY SHERIFF	0	5	13	18	0	6
PAGE TOTAL	23	2,413	6,646	9,082	23	3,870

TRAFFIC ACCIDENTS INVESTIGATED BY JURISDICTION
1990 (cont.)

JURISDICTION	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
SPARTANBURG POLICE DEPT.	4	704	1,630	2,338	4	1,209
SPRINGDALE POLICE DEPT.	0	28	67	95	0	42
SPRINGFIELD POLICE DEPT.	0	3	8	11	0	5
ST. GEORGE POLICE DEPT.	1	9	42	52	1	14
ST. MATTHEWS POLICE DEPT.	0	6	6	12	0	9
ST. STEPHENS POLICE DEPT.	1	17	29	47	1	21
STUCKEY POLICE DEPT.	0	0	1	1	0	0
SULLIVANS ISLAND POLICE DEPT.	0	21	85	106	0	33
SUMMERTON POLICE DEPT.	0	6	12	18	0	12
SUMMERVILLE POLICE DEPT.	3	170	478	651	3	283
SUMTER COUNTY SHERIFF	0	0	3	3	0	0
SUMTER POLICE DEPT.	2	290	913	1,205	2	487
SURFSIDE BEACH POLICE DEPT.	0	48	167	215	0	75
SWANSEA POLICE DEPT.	0	8	27	35	0	13
TEGA CAY POLICE DEPT.	0	3	14	17	0	4
TIMMONSVILLE POLICE DEPT.	0	11	26	37	0	26
TRAVELERS REST PUBLIC SAFETY	0	35	120	155	0	53
TURBEVILLE POLICE DEPT.	0	0	5	5	0	0
UNION POLICE DEPT.	0	84	207	291	0	144
USC AT SPARTANBURG PD.	0	2	7	9	0	2
VANCE POLICE DEPT.	1	1	3	5	1	3
VARNVILLE POLICE DEPT.	0	11	13	24	0	14
WAGENER POLICE DEPT.	0	6	1	7	0	9
WALHALLA POLICE DEPT.	1	28	78	107	2	43
WALTERBORO POLICE DEPT.	1	114	258	373	1	209
WARE SHOALS POLICE DEPT.	0	15	28	43	0	23
WELLFORD POLICE DEPT.	0	20	22	42	0	36
WEST COLUMBIA POLICE DEPT.	1	175	465	641	1	310
WEST UNION POLICE DEPT.	0	1	2	3	0	1
WESTMINISTER POLICE DEPT.	1	12	63	76	1	15
WHITMIRE POLICE DEPT.	0	3	16	19	0	3
WHITTEN CENTER POLICE DEPT.	0	0	2	2	0	0
WILLIAMSTON POLICE DEPT.	0	33	66	99	0	49
WILLISTON POLICE DEPT.	0	9	28	37	0	14
WINNSBORO POLICE DEPT.	0	27	83	110	0	54
WOODRUFF POLICE DEPT.	0	29	59	88	0	54
YEMASSEE POLICE DEPT.	0	4	17	21	0	10
YORK POLICE DEPT.	1	83	159	243	2	124
PAGE TOTAL	17	2,016	5,210	7,243	19	3,403
GRAND TOTAL	885	29,776	88,328	118,989	983	48,337

TRAFFIC ACCIDENTS BY HARMFUL EVENT LOCATION - 1990

	TYPE ACCIDENT				PERSONS	
ON TRAFFICWAY	Fatal	Injury	PDO	Total	Killed	Injured
ON ROADWAY						
AT INTERSECT	159	10,917	28,304	39,380	181	19,299
AT INTERSECT IN CRSWLK	0	164	457	621	0	270
NONJUNCTION	437	11,833	42,651	54,921	489	18,940
NONJUNCTION IN CRSWLK	1	23	103	127	1	35
ON ISLAND	1	28	103	132	1	47
ON ISLAND CRSWLK	0	3	10	13	0	5
INTERCHANGE RAMP	1	147	555	703	1	225
OTHER	15	1,043	3,575	4,633	15	1,716
OFF ROADWAY						
MEDIAN	12	188	557	757	12	262
ISLAND	0	15	56	71	0	21
SHOULDER LEFT	42	793	1,598	2,433	46	1,080
SHOULDER RIGHT	51	1,202	2,997	4,250	58	1,702
DRWY ACCESS	4	250	1,034	1,288	4	363
DRWY ACCESS IN CRSWLK	0	9	31	40	0	11
ROADSIDE, LEFT	61	1,018	1,684	2,763	66	1,371
ROADSIDE, RIGHT	62	1,377	2,817	4,256	66	1,923
SIDEWALK, LEFT	2	36	79	117	2	51
SIDEWALK, RIGHT	1	64	138	203	1	87
OTHER	10	228	761	999	12	320
OFF TRAFFICWAY						
OUTSIDE TRFWY, LEFT	13	170	281	464	14	235
OUTSIDE TRFWY, RIGHT	12	241	456	709	13	338
NOT STATED	1	27	81	109	1	36
TOTALS	885	29,776	88,328	118,989	983	48,337

Note: Abbreviations - INTERSECT=INTERSECTION, CRSWLK=CROSSWALK, DRWY=DRIVEWAY, TRFWY=TRAFFICWAY.

In 1990 the leading Harmful Event Location, by a wide margin, for both fatal and non-fatal accidents was "On Roadway - Nonjunction". These are accidents which occurred on the roadway at any location besides an intersection, island or ramp. Slightly less than half of the fatal accidents and just under half of the property damage only accidents occurred at a Nonjunction. The second leading Harmful Event Location was at an Intersection. Nearly 1/3 of the property damage accidents were at an intersection. A smaller percentage of the fatal accidents (17.97%) were at an intersection. A much larger proportion of fatal accidents occurred off the roadway. Off-Roadway and Off-Trafficway accidents accounted for 25.99% of all accidents involving fatalities, compared to only 14.14% of the property damage only accidents.

MOTOR VEHICLE ACCIDENTS OCCURRING IN CONSTRUCTION WORK AREAS
1988 - 1990

YEAR	HIGHWAY CLASSIFICATION	TOTAL ACCIDENTS	PERSONS KILLED	PERSONS INJURED
1988	Interstate	230	0	49
	U.S. Primary	249	3	139
	S.C. Primary	185	1	58
	Secondary	180	1	74
	County	37	0	9
	Other Public	1	0	0
	1988 Total	**891**	**5**	**329**
1989	Interstate	297	1	90
	U.S. Primary	148	1	58
	S. C. Primary	130	1	69
	Secondary	154	1	74
	County	50	0	15
	Other Public	2	0	1
	1989 Total	**781**	**4**	**307**
1990	Interstate	170	5	43
	U.S. Primary	159	1	68
	S.C. Primary	99	2	33
	Secondary	171	2	61
	County	43	0	9
	1990 Total	**643**	**10**	**214**

The majority of accidents in Construction Work Zones occurred on dry pavement, during clear weather conditions and during daylight hours. The leading probable causes of accidents in Construction work Zones were inattention, following too closely, failure to yield right of way and exceeding the speed limit.

The number of accidents occurring in construction work areas declined by 138 or 17.7% in 1990, dropping from 781 accidents to 643. A total of 2,315 accidents occurred in construction work areas during the three year period of 1988 through 1990. This represents 0.6% of all traffic accidents during this three year period. A total or 19 persons were killed in these accidents; ten were killed in 1990. This represents 0.6% of all traffic fatalities reported during the three year period and 1.0% for 1990.

D. Environment

The environment in which motorists operate their vehicles can contribute to the occurrence of traffic accidents. Environment is defined herein as the combination of external or extrinsic physical conditions that affect and influence the operation of a motor vehicle. These include, surface, weather, light conditions, traffic control, road character and road defect. In addition to these six environmental factors, the "locale" through which the roadway passes may also impact the motoring environment. These locale factors are as follows:

Locale	Accidents #	Accidents %
Open Country	40,891	34.4
Residential	24,990	21.0
Shopping or Business	49,326	41.4
Manufacturing/Industrial	1,439	1.2
School or Playground	1,799	1.5
Hospital	419	0.4
Not Stated	125	0.1
TOTAL	**118,989**	**100.0**

One or more of the environmental factors can be the primary cause of an accident or may be a contributing factor in a given accident. Weather, light and surface conditions are substantially beyond the control of engineering or law enforcement efforts. The other three factors are a function of the resources applied to highway construction. Over time, traffic control, road character and road defect factors have improved on the state's highways. This is reflected in reduced accidents and fatalities per 100 million miles of vehicle travel.

As reflected in the statistics on the next three pages, most accidents occur under the most favorable environmental conditions: dry roadway (79.4%), clear weather (73.5%), daylight (70.2%), straight-level roadway (73.1%), no road defect (98.1%) and no traffic control device (63.5%).

For fatal accidents, the percentages of accidents which occurred under the most favorable surface and weather conditions were even higher. For the light and road character factors, fatal accidents occurred at higher percentages under the less than favorable conditions than for all accidents. The percentage of fatal accidents occurring under the most favorable environmental conditions are as follows: dry roadway (82.3%), clear weather (76.7%), daylight (44.5%), straight-level roadway (57.1%), no road defect (98.0%) and no traffic control (75.7%).

Environmental factors were the probable cause in only 5.45% of all accidents. The environment may have been a contributing factor to accidents where it was not the primary probable cause. Efforts to improve those environmental factors which can be controlled (especially traffic control, road character and road defect) should help to reduce the frequency of accidents in South Carolina.

ENVIRONMENTAL CONDITIONS - ALL AND FATAL ACCIDENTS

1990

SURFACE CONDITIONS

SURFACE CONDITIONS	ALL ACCIDENTS #	ALL ACCIDENTS %	FATAL ACCIDENTS #	FATAL ACCIDENTS %
Dry	94,513	79.43	729	82.38
Wet	24,078	20.23	150	16.95
Icy	20	0.02	1	0.11
Slushy	9	0.01	0	0.00
Snowy	27	0.02	0	0.00
Muddy	76	0.06	0	0.00
Debris	45	0.04	1	0.11
Other	221	0.19	4	0.45
Total	118,989	100.00	885	100.00

Nearly 4 out of 5 reported traffic accidents occurred on dry pavement in 1990. An even greater proportion (more than 4 out of 5) of the fatal accidents occurred on dry pavement. Less than 1 percent of all accidents occurred on icy, slushy, or snowy pavement.

WEATHER CONDITIONS

WEATHER CONDITIONS	ALL ACCIDENTS #	ALL ACCIDENTS %	FATAL ACCIDENTS #	FATAL ACCIDENTS %
Fog, Smoke, Smog	1,895	1.59	26	2.94
Hail	52	0.04	0	0.00
High Wind	110	0.09	0	0.00
Clear	87,442	73.49	679	76.72
Cloudy	12,203	10.26	96	10.85
Rain	17,187	14.45	83	9.38
Snow, Sleet	13	0.01	1	0.11
Other	87	0.07	0	0.00
Total	118,989	100.00	885	100.00

More than 4 out of 5 accidents occurred in clear or cloudy weather conditions. Slightly less than 1 out 7 occurred in rainy weather. Traffic accidents in all other weather conditions accounted for slightly more than 1 in 55 accidents. The percentage of fatal accidents occurring in clear or cloudy weather is even higher, accounting for nearly 88% of the total. Fatal accidents in rainy weather accounted for slightly less than 1 out of every 10 reported fatal accidents.

ENVIRONMENTAL CONDITIONS - ALL AND FATAL ACCIDENTS

1990

LIGHT CONDITIONS

LIGHT CONDITIONS	ALL ACCIDENTS #	ALL ACCIDENTS %	FATAL ACCIDENTS #	FATAL ACCIDENTS %
Daylight	83,492	70.17	394	44.52
Dawn	1,419	1.19	22	2.49
Dusk	2,889	2.43	23	2.60
Dark (Lighting Unspecified)	3,667	3.08	45	5.09
Dark ('Street Lamps Lit)	10,386	8.73	75	8.47
Dark (Street Lamps not Lit)	682	0.57	11	1.24
Dark (No Lights)	16,430	13.81	315	35.59
Unknown	24	0.02	0	0.00
Total	118,989	100.00	885	100.00

More than 2 out of every 3 traffic accidents occurred in daylight. This comes in spite of the poorer visibility conditions associated with dawn, dusk or darkness. For fatal accidents, the percentage occurring in daylight falls sharply to 44.52%. Only 13.81% of all accidents occurred in dark lighting conditions with no street lamps. However, for fatal accidents, the proportion occurring in darkness was much higher with 35.59% of the total.

TRAFFIC CONTROLS

TRAFFIC CONTROLS	ALL ACCIDENTS #	ALL ACCIDENTS %	FATAL ACCIDENTS #	FATAL ACCIDENTS %
Stop Sign	16,303	13.70	104	11.75
Stop Signal	18,846	15.84	26	2.94
Yield Sign	2,128	1.79	6	0.68
Officer /Flagman	321	0.27	2	0.22
RR Gates/Lights	78	0.07	3	0.34
RR Lights	48	0.04	2	0.22
None	75,502	63.45	670	75.71
Other Sign	3,991	3.35	50	5.65
RR Crossbucks	58	0.05	3	0.34
Other	1,714	1.44	19	2.15
Total	118,989	100.00	885	100.00

In 1990, slightly less than 2/3 of all traffic accidents occurred at locations that had no traffic control. This percentage was even higher in fatal accidents, where sightly more than 3 out of 4 accidents took place where there was no traffic control device. Accidents occurring at locations controlled by a stop signal accounted for about 1 out of 6 accidents, but only 1 out of 34 accidents involving fatalities.

ENVIRONMENTAL CONDITIONS - ALL AND FATAL ACCIDENTS

1990

ROAD CHARACTER

ROAD CHARACTER	ALL ACCIDENTS		FATAL ACCIDENTS	
	#	%	#	%
Straight - Level	87,027	73.14	505	57.06
Straight - On Grade	16,664	14.00	133	15.03
Straight - Hillcrest	2,324	1.95	16	1.81
Curve - Level	8,040	6.76	138	15.59
Curve '- On Grade	4,492	3.78	86	9.72
Curve - Hillcrest	372	0.31	6	0.68
Unknown	70	0.06	1	0.11
Total	118,989	100.00	885	100.00

In 1990 more than 73 percent of all accidents occurred on straight and level roadways. For fatal accidents only 57.06% occurred on straight and level roadways. The three "straight" categories combined accounted for 89.09% of all accidents but only 73.90% of the fatal accidents. The proportion of fatal accidents occurring on a curve (either level, on grade or on a hillcrest) was more than twice as great for fatal accidents (25.99%) as for non-fatal (10.85%).

ROAD DEFECT

ROAD DEFECT	ALL ACCIDENTS		FATAL ACCIDENTS	
	#	%	#	%
None	116,736	98.11	867	97.96
Shoulder Defect	275	0.23	3	0.34
Soft Shoulder	130	0.11	0	0.00
Low Shoulder	162	0.14	3	0.34
High Shoulder	60	0.05	0	0.00
Ruts, Holes, Bumps	488	0.41	2	0.23
Worn, Polished Surface	169	0.14	2	0.23
Construction/Maintenance	643	0.54	7	0.79
Other	326	0.27	1	0.11
Total	118,989	100.00	885	100.00

For all reported accidents in 1990, only 1.89% occurred on a road with some type of defect which contributed to the accident. The most common defect was "Road Under Construction/Maintenance" with 643 accounting for less than 1% of all accidents. An even higher percentage (97.96%) of fatal accidents occurred on roads with no defects contributing to the accident. Only 18 fatal accidents occurred on a defective road, 7 of these in a construction/maintenance area.

E. Vehicles

The consequences of a traffic accident are affected by the types of "units" (see definitions) which are involved. A collision between a relatively large unit, such as a truck tractor or train, and a smaller unit, such as a motorcycle or bicycle, transmits a substantially greater force to the smaller vehicle, and hence to its occupants or riders, than an accident between two vehicles of comparable size. This irrefutable law of physics probably accounts for the overrepresentation of certain "unit types" in fatal accidents in 1990. On the following pages, accidents involving different "unit types" are presented. Some of the key findings in this data are as follows:

- The most common unit involved in traffic accidents in 1990 was the automobile. Out of the 219,919 units involved in traffic accidents during the year, 165,656 were automobiles. This represents 75.3% of the total units.

- For fatal accidents, a much smaller percentage of units were automobiles. Of the 1,480 units involved in fatal accidents, 867 or 58.6% were automobiles. This represents 0.5% of the automobiles involved in traffic accidents in 1990.

- A total of 111 pedestrians were involved in fatal accidents in 1990. (106 of these were killed; five other pedestrians were involved in a fatal accident in which another person was killed.) This represents 7.7% of the 1,435 pedestrians involved in all traffic accidents, a proportion nearly **15 times** greater than for persons traveling in automobiles.

- Ten (10) railway trains were involved in traffic accidents resulting in fatalities. This represents 8.5% of the 118 trains involved in all traffic accidents during 1990, a percentage **16 times** greater than for automobiles. This represents the highest percentage of accidents resulting in fatalities of any of the unit types.

- Forty-nine (49) motorcycles were involved in fatal accidents in 1990. This represents 3.0% of all motorcycles involved in traffic accidents, **6 times** the rate for automobiles.

- A total of 108 truck tractors was involved in fatal accidents in 1990. This represents 2.1% of the truck tractors involved in accidents during the year, **4 times the rate for automobiles. This percentage is substantially higher than the 1.5% recorded in 1989.**

MOTOR VEHICLE REGISTRATIONS BY COUNTY

	1989		1990	
County	Registrations	Percent	Registrations	Percent
Abbeville	18,566	0.7	18,294	0.7
Aiken	96,250	3.8	100,180	3.9
Allendale	6,499	0.3	6,434	0.2
Anderson	115,772	4.6	117,320	4.6
Bamberg	10,300	0.4	10,229	0.4
Barnwell	15,114	0.6	15,310	0.6
Beaufort	54,675	2.2	57,206	2.2
Berkeley	82,371	3.3	87,032	3.4
Calhoun	10,463	0.4	10,700	0.4
Charleston	186,530	7.4	191,909	7.4
Cherokee	34,363	1.4	34,497	1.3
Chester	23,781	0.9	24,081	0.9
Chesterfield	27,792	1.1	28,064	1.1
Clarendon	18,440	0.7	18,751	0.7
Colleton	23,531	0.9	24,429	0.9
Darlington	42,640	1.7	43,478	1.7
Dillon	19,062	0.8	19,111	0.7
Dorchester	53,612	2.1	56,631	2.2
Edgefield	14,253	0.6	14,579	0.6
Fairfield	15,697	0.6	15,905	0.6
Florence	80,217	3.2	81,529	3.2
Georgetown	31,375	1.2	32,193	1.2
Greenville	253,463	10.0	256,133	9.9
Greenwood	46,332	1.8	46,723	1.8
Hampton	12,236	0.5	12,372	0.5
Horry	103,965	4.1	108,255	4.2
Jasper	9,697	0.4	9,805	0.4
Kershaw	37,289	1.5	37,690	1.5
Lancaster	42,464	1.7	42,765	1.7
Laurens	44,901	1.8	45,376	1.8
Lee	11,068	0.4	11,179	0.4
Lexington	141,249	5.6	144,213	5.6
McCormick	5,825	0.2	5,815	0.2
Marion	20,568	0.8	20,514	0.8
Marlboro	17,138	0.7	17,249	0.7
Newberry	27,066	1.1	27,139	1.1
Oconee	48,078	1.9	49,152	1.9
Orangeburg	60,007	2.4	60,839	2.4
Pickens	68,872	2.7	70,348	2.7
Richland	190,447	7.5	194,625	7.6
Saluda	14,172	0.6	14,175	0.6
Spartanburg	178,707	7.1	177,988	6.9
Sumter	65,548	2.6	66,476	2.6
Union	21,904	0.9	22,138	0.9
Williamsburg	23,210	0.9	23,360	0.9
York	101,615	4.0	104,789	4.1
STATE TOTALS	2,527,124	100.0	2,576,980	100.0

UNIT TYPES INVOLVED IN MOTOR VEHICLE TRAFFIC ACCIDENTS

1990

UNIT TYPE	TYPE ACCIDENT Fatal	 Injury	 PDO	 Total
Automobile*	867	41,180	123,609	165,656
Pickup Truck*	210	7,727	24,855	32,792
Truck Tractor*	108	997	3,941	5,046
Other Truck*	67	1,843	6,563	8,473
Motorcycle*	49	1,153	436	1,638
Moped	5	81	30	116
Pedalcycle	28	671	185	884
Minibike	0	9	1	10
Animal Drawn Vehicle	0	3	2	5
Animal (Ridden)	0	4	4	8
Pedestrian	111	1,140	184	1,435
Train	10	39	69	118
School Bus*	2	106	525	633
Passenger Bus*	2	112	380	494
Other**	13	307	996	1,316
Unknown (Hit & Run Only)*	8	171	1,116	1,295
TOTALS	1,480	55,543	162,896	219,919

A motor vehicle traffic accident is defined by the National Safety Council (NSC) as a motor vehicle accident in which: (1) the unstabilized situation originates on a trafficway or, (2) a harmful event occurs on a trafficway. Using the NSC definition, each of the unit types listed above was involved in an accident which included at least one motor vehicle. Units considered motor vehicles are denoted with an asterisk (*). Units denoted by (**) may or may not be a motor vehicle, depending on the means by which they were propelled. For units not considered motor vehicles, the accident included at least one other unit which was a motor vehicle.

A total of 165,656 (75.33%) of the 219,919 total units involved in South Carolina traffic accidents in 1990 were automobiles. Of these, 867 or approximately 0.52%, were involved in fatal accidents. This compares to 0.64% of the pickup trucks, 2.14% of the truck tractors, 2.99% of the motorcycles and 7.74% of the pedestrians.

The 165,656 automobiles involved in traffic accidents represent 9.16% of all automobiles registered in South Carolina during 1990. The 1,638 motorcycles represent 5.30% of all motorcycles registered during the year.

VEHICLE MANEUVER IN ALL ACCIDENTS

1990

MANEUVER	Number	Percentage
MOVEMENTS ESSENTIALLY STRAIGHT		
Moving Straight, Details Unknown	15,025	6.8
Straight Ahead In Proper Direction	60,711	27.6
O'taking Veh. on Left, Left of Center Line	1,457	0.7
O'taking Veh. on Left, Right of Center Line*	401	0.2
O'taking Veh. on Right	769	0.3
Straight Ahead in Left Turn Lane	204	0.1
Straight Ahead in Right Turn Lane	130	0.1
Changing Lanes to Left	2,368	1.1
Changing Lanes to Right	2,598	1.2
Merging From Left (Roadway Narrows on Left)	127	0.1
Merging From Right (Roadway Narrows on Right	308	0.1
On Wrong Side of Roadway	1,325	0.6
In Wrong Direction on One Way Roadway	96	0.0
Swerving To Left	7,559	3.4
Swerving To Right	8,232	3.7
Slowing or Stopping	16,892	7.7
Skidding Longitudinally	17,975	8.2
Skidding Laterally	3,606	1.6
Spinning or Yawing	2,858	1.3
Jack Knifing	244	0.1
Stopped in Traffic	20,518	9.3
Starting From Stop	5,743	2.6
Increased Speed	634	0.3
TURNING MOVEMENTS		
Turning Details Unknown	1,056	0.5
Left, From Left Turn Bay	2,718	1.2
Left, From Left (Proper) Lane	11,944	5.4
Left, From Other Lane, Legal	3,681	1.7
Left, From Other Lane, Illegal	1,240	0.6
Left, From Unknown Lane	251	0.1
U-Turn	1,063	0.5
Right From Special Lane	144	0.1
Right From Right (Proper) Lane	4,010	1.8
Right From Other Lane, Legal	698	0.3
Right From Other Lane, Illegal	887	0.4
Right From Unknown Lane	124	0.1
ENTERING TRAFFIC LANE		
Entering Traffic Lane, Details Unknown	881	0.4
From Entrance Ramp On Left	131	0.1
From Entrance Ramp On Right	426	0.2
From Shoulder, On Left	181	0.1
From Shoulder, On Right	523	0.2
From Parking Space At Left Curb	46	0.0
From Parking Space At Right Curb	258	0.1
From Driveway On Left	781	0.4
From Driveway On Right	2,396	1.1

VEHICLE MANEUVER IN ALL ACCIDENTS

1990 (cont.)

MANEUVER	Number	Percentage
LEAVING TRAFFIC LANE		
Leaving Traffic Lane, Details Unknown	353	0.2
To Exit Ramp On Left	32	0.0
To Exit Ramp On Right	99	0.0
To Shoulder On Left	732	0.3
To Shoulder On Right	1,376	0.6
To Parking Space At Left Curb	70	0.0
To Parking Space At Right Curb	152	0.1
To Driveway On Left	382	0.2
To Driveway On Right	290	0.1
PARKING ON OR ADJACENT TO TRAFFIC LANE		
Parking, Details Unknown	252	0.1
On Left Shoulder	140	0.1
On Right Shoulder	527	0.2
At Left Curb	89	0.0
At Right Curb	412	0.2
In Traffic Lane On Left (Rural)	40	0.0
In Traffic Lane On Right (Rural)	97	0.1
Double Parked On Left	6	0.0
Double Parked On Right	19	0.0
MISCELLANEOUS MOVEMENTS		
Other Miscellaneous, Details Unknown	517	0.2
Backing in Roadway	2,712	1.2
Backing From Angle, Parking On Left	214	0.1
Backing From Angle, Parking On Right	501	0.2
Backing Across Traffic	672	0.3
Backing On Shoulder	160	0.1
Vehicle Pushed By Other Vehicle	273	0.1
Vehicle Pushed By Pedestrian	30	0.0
Driverless Vehicle In Motion	260	0.1
Not In Motion (Parked, Abandoned, Or Standing)	3,753	1.7
Unknown	1,092	0.5
Not Applicable (I.E. for a Pedestrian)	1,448	0.7
TOTAL	219,919	100.0

* - Applies to one way streets only.

By far the most frequent vehicle maneuver for vehicles involved in traffic accidents in 1990 was "Straight Ahead in the Proper Direction" with 27.6% of the total units. The next maneuver, "Stopped in Traffic", accounted for 9.3% of the units. The third, fourth and fifth maneuvers involved vehicles which were "Skidding Longitudinally" (8.2%), followed by "Slowing or Stopping" (7.7%) and "Moving Straight, Details Unknown" (6.8%). Combined, the top five categories accounted for almost 60% of all vehicles involved in traffic accidents.

MOTORCYCLE STATISTICS IN SOUTH CAROLINA

1967-1990

YEAR	TOTAL ACCIDENTS	FATAL ACCIDENTS	PERSONS KILLED	PERSONAL INJURY ACCIDENTS	PERSONS INJURED	PROPERTY DAMAGE ACCIDENTS	MOTORCYCLE REGISTRATIONS	REGISTRATION DEATH RATE[1]	REGISTRATION ACCIDENT RATE[2]
1967[3]	368	9	10	238	304	121	11,945	8.4	3.1
1968[4]	280	9	9	194	230	77	12,143	7.4	2.3
1969	272	8	9	191	231	73	12,924	7.0	2.1
1970	607	15	15	348	433	244	15,633	9.6	3.9
1971	907	22	23	506	599	379	17,870	12.9	5.1
1972	1,223	37	39	684	814	501	22,515	17.3	5.4
1973[5]	1,958	49	50	1,046	1,232	863	33,268	15.0	5.9
1974	2,319	59	60	1,225	1,468	1,035	47,328	12.7	4.9
1975[6]	1,913	51	54	1,001	1,186	861	48,040	11.2	4.0
1976	1,835	47	47	947	1,171	814	45,686	10.3	4.0
1977	1,765	51	53	903	1,067	809	41,161	12.9	4.3
1978	1,561	38	38	849	1,011	673	35,280	10.8	4.4
1979	1,543	40	42	890	1,063	611	37,466	11.2	4.1
1980[7]	1,764	54	55	986	1,165	723	38,875	14.1	4.5
1981	1,934	45	46	1,107	1,315	781	42,257	10.8	4.6
1982	2,019	58	61	1,135	1,382	823	35,028	17.4	5.8
1983	2,091	74	81	1,110	1,368	905	36,130	22.0	5.8
1984	2,593	89	92	1,376	1,648	1,122	37,119	24.8	7.0
1985	2,432	83	87	1,361	1,636	988	37,366	23.3	6.5
1986	2,284	73	75	1,281	1,535	929	36,074	20.8	6.3
1987	1,908	54	56	1,081	1,282	771	32,710	17.1	5.8
1988	1,580	62	63	1,134	1,415	384	31,483	20.3	5.0
1989	1,359	44	46	900	1,130	415	29,965	15.4	4.5
1990	1,612	49	51	1,135	1,407	428	30,907	16.5	5.2

---

1 - Based on 10,000 cycle registrations.
2 - Based on 100 cycle registrations.
3 - Safety Equipment Law enacted but not enforced.
4 - Enforcement of Safety Equipment Law initiated.
5 - Lights On Law effective July 1.
6 - Implemented Classified License Law for motorcycles.
7 - Helmet and Goggles Law amended effective June 17, exempting cyclists age 21 and older.

TRAFFIC ACCIDENTS INVOLVING MOTORCYCLES

1990

TYPE ACCIDENT	ACCIDENTS	PERCENTAGE
Fatal	49	3.04
Injury	1,135	70.41
Property Damage Only (PDO)	428	26.55
TOTAL	1,612	100.00

Casualties

Persons Killed: 51*   Persons Injured*: 1,407

Motorcycle Accidents by Month

	TYPE ACCIDENT				PERSONS	
MONTH	Fatal	Injury	PDO	Total	Killed*	Injured*
January	0	46	17	63	0	52
February	0	59	23	82	0	68
March	6	65	38	109	6	88
April	2	130	34	166	2	169
May	5	121	43	169	6	144
June	7	145	54	206	7	188
July	7	137	51	195	7	166
August	5	136	43	184	6	173
September	8	104	42	154	8	126
October	6	92	38	136	6	113
November	2	66	31	99	2	83
December	1	34	14	49	1	37
TOTALS	49	1,135	428	1,612	51	1,407

Motorcycle Accidents by Light and Weather Conditions

	TYPE ACCIDENT				PERSONS	
LIGHT AND WEATHER	Fatal	Injury	PDO	Total	Killed*	Injured*
Day and Clear/Cloudy	19	637	245	901	21	782
Dark and Clear/Cloudy	30	457	159	646	30	576
Day and Rain	0	15	11	26	0	19
Dark and Rain	0	15	10	25	0	17
Day and Other Weather	0	4	1	5	0	6
Dark and Other Weather	0	7	2	9	0	7
TOTALS	49	1,135	428	1,612	51	1,407

There were a total of 1,638 motorcycles involved in the 1,612 motorcycle accidents which occurred in 1990. This indicates that some accidents had two or more cycles involved. These accidents took the lives of 51 persons, 50 of whom were drivers or passengers of a motorcycle. A total of 1,407 persons were injured in these accidents, 1,293 of whom were on a motorcycle. A total of 1,074 (66.63%) of the motorcycle accidents occurred during the period April 1 through September 30. This same six month period accounted for 34 (69.39%) of the fatal accidents.

The overwhelming majority of both total and fatal motorcycle accidents occurred during clear or cloudy weather conditions. A total of 1,547 (95.97%) motorcycle accidents occurred when there was no rain, snow or other bad weather. All of the fatal accidents occurred under these conditions.

Most (932/57.82%) motorcycle accidents occurred during daylight hours. For fatal accidents, 19 occurred during daylight hours; 30 at night, dawn or dusk.

* Includes all fatalities and injuries in the accident, not just to motorcycle riders.

TRAFFIC ACCIDENTS INVOLVING MOTORCYCLES

1990 (cont.)

Sex of Cyclists

	TYPE CASUALTY			
SEX	Fatality	Non Fatal Injury	Not Injured	Total
Male	45	1,150	480	1,675
Female	5	143	48	196
Unknown	0	0	4	4
TOTAL	50	1,293	532	1,875

Age and Helmet Usage of Cyclists

	TYPE CASUALTY			
HELMET USED	Fatality	Non Fatal Injury	Not Injured	Total
Under 15	0	12	5	17
15-20	3	158	71	232
21-24	1	91	44	136
25-34	2	93	43	138
35-44	4	39	12	55
45 and Over	0	35	11	46
SUBTOTAL	10	428	186	624
HELMET NOT USED				
Under 15	0	22	12	34
15-20	10	208	79	297
21-24	10	199	58	267
25-34	14	237	77	328
35-44	4	101	43	148
45 and Over	1	40	22	63
SUBTOTAL	39	807	291	1,137
UNKNOWN HELMET USAGE				
Under 15	0	2	2	4
15-20	1	9	12	22
21-24	0	11	10	21
25-34	0	21	14	35
35-44	0	7	6	13
45 and Over	0	8	11	19
SUBTOTAL	1	58	55	114
TOTALS	50	1,293	532	1,875

Out of the 50 motorcycle riders killed in 1990, 45 were male, 25 were under age 25 and 39 were not wearing a helmet. Out of the 1,875 riders of motorcyclists who were involved in traffic accidents, 624 were wearing a helmet, and 1,137 were not; for 114 riders, helmet usage was unknown. For those cyclists under 21 years of age, helmet usage is required by law. For this group, 249 were wearing a helmet and 331 were not wearing a helmet; for 26, helmet usage was unknown.

One out of every 62 helmeted motorcycle riders who were involved in a traffic accident was killed in 1990, compared to one out of every 29 unhelmeted riders. Without an in-depth examination of the types of injuries sustained in these fatal accidents, no conclusion can be drawn as to whether the use of a helmet could have prevented the deaths of these unhelmeted riders; however; if South Carolina's fatal motorcycle accidents parallel those represented in national studies examining the helmet issue (and there is no reason to suspect otherwise), it may be hypothesized that with increased helmet usage would come a reduction in the number of motorcycle fatalities and injuries resulting from head trauma.

TRAFFIC ACCIDENTS INVOLVING MOPEDS

1990

TYPE ACCIDENT	ACCIDENTS	PERCENTAGE
Fatal	5	4.35
Injury	80	69.57
Property Damage Only (PDO)	30	26.09
TOTAL	115	100.00

Casualties

Persons Killed: 5 Persons Injured*: 93

Moped Accidents by Month

	------ TYPE ACCIDENT ------				---- PERSONS ----	
MONTH	Fatal	Injury	PDO	Total	Killed	Injured*
January	0	5	2	7	0	7
February	0	4	0	4	0	4
March	0	4	7	11	0	5
April	2	7	0	9	2	8
May	0	12	2	14	0	14
June	0	8	1	9	0	9
July	0	9	2	11	0	11
August	1	6	4	11	1	8
September	0	7	4	11	0	8
October	1	8	3	12	1	9
November	0	7	2	9	0	7
December	1	3	3	7	1	3
TOTALS	5	80	30	115	5	93

Moped Accidents by Light & Weather Conditions

	------ TYPE ACCIDENT -----				---- PERSONS ----	
LIGHT/WEATHER	Fatal	Injury	PDO	Total	Killed	Injured*
Day and Clear/Cloudy	3	56	18	77	3	64
Dark and Clear/Cloudy	2	21	8	31	2	26
Day and Raining	0	1	2	3	0	1
Dark and Raining	0	0	2	2	0	0
Day and Other Weather	0	1	0	1	0	1
Dark and Other Weather	0	1	0	1	0	1
TOTALS	5	80	30	115	5	93

* Includes all injuries in the accident, not just to the moped rider.

TRAFFIC ACCIDENTS INVOLVING MOPEDS

1990 (cont.)

Age And Sex of Moped Riders

AGE	TYPE CASUALTY							
	Fatality		Non Fatal Injury		Not Injured		Total	
	M**	F	M	F	M	F	M	F
Under 10	0	0	0	0	1	0	1	0
10-11	0	0	2	1	0	1	2	2
12-15	0	0	10	1	5	1	15	2
16-20	0	0	7	1	5	0	12	1
21-30	0	0	20	1	5	1	25	2
Over 30	5	0	40	2	11	2	56	4
TOTALS	5	0	79	6	27	5	111	11

Moped Accidents: Who Contributed to The Accident?

Units Involved	TYPE ACCIDENT			
	Fatal	Injury	PDO	Total
Mopeds Contributing	2	40	22	64
Mopeds Not Contributing	3	41	8	52
Other Unit Contributing	3	40	8	51
Other Unit Not Contributing	0	35	22	57
TOTALS	8	156	60	224

** M - Male, F - Female

Traffic accidents involving mopeds tended to occur more often during warm weather months in 1990. During the summer months of June, July and August, 31 (26.96%) moped accidents were reported, compared to 18 accidents in the winter months of January, February and December. The five fatal accidents were randomly distributed throughout the year.

Eighty-one (70.43%) of the 115 accidents involving mopeds occurred during daylight hours. The vast majority, 108 (93.91%), occurred during clear or cloudy weather conditions. Only 7 moped accidents occurred during inclement weather.

Nearly half (60/49.18%) of the riders involved in moped accidents were over 30 years of age. Only five (4.10%) moped riders were under twelve; 17 (13.93%) were between 12 and 15 years old. Most of the riders (111/90.98%) were males. All of the moped fatalities were males.

There were a total of 116 mopeds involved in traffic accidents in 1990. There were a total of 108 other unit types involved in these accidents. Of the 116 mopeds, 64 (55.2%) contributed to the accident cause. Of the 108 other units involved in the accident, 51 (47.2%) contributed. In the five fatal accidents, two of the mopeds contributed and three did not. All three of the other units involved in fatal moped accidents contributed to the accident.

TRAFFIC ACCIDENTS INVOLVING BICYCLES

1990

TYPE ACCIDENT	ACCIDENTS	PERCENTAGE
Fatal	28	3.20
Injury	664	75.80
Property Damage Only (PDO)	184	21.00
TOTAL	876	100.00

Casualties

Persons Killed: 28	Persons Injured*: 707

Bicycle Accidents by Month

	------ TYPE ACCIDENT ------				---- PERSONS ----	
MONTH	Fatal	Injury	PDO	Total	Killed	Injured*
January	3	29	8	40	3	31
February	1	47	16	64	1	48
March	0	50	12	62	0	51
April	0	53	18	71	0	55
May	1	62	19	82	1	64
June	1	83	25	109	1	90
July	2	69	28	99	2	77
August	6	80	19	105	6	88
September	5	60	15	80	5	67
October	4	60	8	72	4	63
November	2	34	8	44	2	36
December	3	37	8	48	3	37
TOTALS	28	664	184	876	28	707

Bicycle Accidents by Light & Weather Conditions

	------ TYPE ACCIDENT -----				---- PERSONS ----	
LIGHT/WEATHER	Fatal	Injury	PDO	Total	Killed	Injured*
Day and Clear/Cloudy	10	486	139	635	10	511
Dark and Clear/Cloudy	15	143	37	195	15	158
Day and Raining	0	14	4	18	0	14
Dark and Raining	1	13	2	16	1	15
Day and Other Weather	2	4	2	8	2	4
Dark and Other Weather	0	4	0	4	0	5
TOTALS	28	664	184	876	28	707

---

* Includes all injuries in the accident, not just to the cyclists.

TRAFFIC ACCIDENTS INVOLVING BICYCLES

1990 (cont.)

Age and Sex of Cyclists**

AGE	TYPE CASUALTY							
	Fatality		Non Fatal Injury		Not Injured		Total	
	M***	F	M	F	M	F	M	F
Under 10	1	1	106	35	20	7	127	43
10-11	2	0	48	22	9	4	59	26
12-15	2	0	100	13	35	5	137	18
16-20	2	0	53	21	22	5	77	26
21-30	4	1	100	18	29	7	133	26
Over 30	14	1	141	13	39	4	194	18
TOTALS	25	3	548	122	154	32	727	157

** Bicycle accidents may involve more than one cyclist. Age and sex information was not recorded for some cyclists.

*** M - Male, F - Female

As with motorcycle and moped accidents, the largest proportions of bicycle accidents tend to occur during the warm weather months. More than twice as many bicycle accidents occurred in June, July and August (313) than in January, February and December (152). The three summer months accounted for 35.73% of all bicycle accidents; the three winter months, for 17.35%.

The vast majority, (830/94.75%) of all bicycle accidents occurred during clear or cloudy weather, including twenty-five of the twenty-eight fatal accidents. Most bicycle accidents occurred in the daylight hours (661/75.46%); however, sixteen of the twenty-eight (57.14%) fatal accidents took place at night.

The age of bicycle riders was fairly evenly distributed across all age groups. A total of 159 (17.99%) riders were between age 21 and 30; 212 (23.98%) were over 30 years of age; and 170 (19.23%) were under ten years of age; these were the top three age categories. Sixteen of the twenty-eight persons fatally injured were over 30 years of age; four were under age 12. A total of 727 (82.24%) of the cyclists were males. Twenty-five of the twenty-eight bicycle fatalities were males.

TRAFFIC ACCIDENTS INVOLVING SCHOOL BUSES

1990

School Bus Accidents 1986-1990

	TYPE ACCIDENT			
YEAR	Fatal	Injury	PDO	Total
1986	2	133	742	877
1987	1	130	769	900
1988	6	118	575	699
1989	2	124	558	684
1990	2	100	514	616

Summary of School Bus Accidents in 1990

TYPE ACCIDENT	ACCIDENTS	PERCENTAGE
Fatal	2	0.33
Injury	100	16.23
Property Damage Only (PDO)	514	83.44
TOTAL	616	100.00

Casualties

Persons Killed*: 4 Persons Injured**: 335

School Bus Accidents by Light & Weather Conditions

	TYPE ACCIDENT				PERSONS	
LIGHT/WEATHER	Fatal	Injury	PDO	Total	Killed*	Injured**
Day and Clear/Cloudy	0	73	433	506	0	269
Dark and Clear/Cloudy	1	4	23	28	2	7
Day and Raining	1	20	47	68	2	55
Dark and Raining	0	1	3	4	0	2
Day and Other Weather	0	1	7	8	0	1
Dark and Other Weather	0	1	1	2	0	1
TOTALS	2	100	514	616	4	335

Age of Bus Drivers

	TYPE ACCIDENT			
AGE	Fatal	Injury	PDO	Total
15-17	0	1	0	1
18-20	1	23	91	115
21-25	0	17	82	99
26-35	0	26	144	170
Over 35	1	36	193	230
Unknown	0	3	15	18
TOTAL DRIVERS	2	106	525	633

---

* All four fatalities were to occupants of vehicles other than the school bus.

** Includes all injuries in the accident, not just to school bus occupants.

TRAFFIC ACCIDENTS INVOLVING SCHOOL BUSES

1990 (cont.)

School Bus Accidents by Month

	TYPE ACCIDENT				PERSONS	
MONTH	Fatal	Injury	PDO	Total	Killed*	Injured**
January	0	8	68	76	0	18
February	0	8	44	52	0	31
March	0	11	50	61	0	38
April	0	6	52	58	0	7
May	0	16	74	90	0	64
June	0	2	9	11	0	6
July	0	2	3	5	0	2
August	0	2	19	21	0	2
September	1	11	50	62	2	32
October	1	14	65	80	2	36
November	0	11	44	55	0	83
December	0	9	36	45	0	16
TOTALS	2	100	514	616	4	335

---

* All four fatalities were to occupants of vehicles other than the school bus.

** Includes all injuries in the accident, not just school bus occupants.

The number of school bus accidents declined by 68 in 1990 compared to 1989, a 9.94% reduction. This continues a trend established in 1988. The number of Property Damage Only (PDO) accidents declined by 44 and the number of fatal accidents remained the same. Injury accidents decreased by twenty-four.

As would be expected, few school bus accidents occurred during the summer months; for example, only five accidents were reported in the month of July. The month with the most accidents was May with 90.

The vast majority of school bus accidents occurred during the daylight hours (582 or 94.48%). A total of 534 school bus accidents occurred in clear or cloudy weather conditions.

Beginning in 1988, drivers were required to be 18 years of age or older. This is reflected in the age of drivers involved in accidents. Only 1 of the 633 drivers was under 18 years of age. 36.33% of school bus drivers were over 35 years of age, the highest percentage of any group.

TRAFFIC ACCIDENTS INVOLVING PEDESTRIANS - 1990

TYPE ACCIDENT	ACCIDENTS	PERCENTAGE
Fatal	104	7.60
Injury	1,088	74.53
Property Damage Only (PDO)	176	12.87
TOTAL	1,368	100.00

Casualties

Persons Killed*: 107 Persons Injured*: 1,222

Pedestrian Accidents by Month

	------ TYPE ACCIDENT ------				---- PERSONS ----	
MONTH	Fatal	Injury	PDO	Total	Killed*	Injured*
January	3	81	13	97	3	92
February	9	86	11	106	9	88
March	5	107	17	129	5	121
April	5	86	10	101	5	97
May	13	94	16	123	13	106
June	12	70	17	99	12	94
July	11	72	18	101	11	77
August	10	94	9	113	10	103
September	8	103	15	126	9	117
October	10	99	18	127	10	111
November	11	82	13	106	13	90
December	7	114	19	140	7	126
TOTALS	104	1,088	176	1,368	107	1,222

Pedestrian Accidents by Light & Weather Conditions

	------ TYPE ACCIDENT -----				---- PERSONS ----	
LIGHT/WEATHER	Fatal	Injury	PDO	Total	Killed*	Injured*
Day and Clear/Cloudy	23	555	99	677	25	613
Dark and Clear/Cloudy	72	425	65	562	73	486
Day and Raining	1	37	5	43	1	41
Dark and Raining	5	46	6	57	5	56
Day and Other Weather	0	3	1	4	0	3
Dark and Other Weather	3	22	0	25	3	23
TOTALS	104	1,088	176	1,368	107	1,222

* Includes all fatalities and injuries occurring in the accident, not just to pedestrians.

Traffic accidents involving pedestrians tend to have a high proportion of fatalities. Of the 1,368 pedestrian accidents which occurred in 1990, 104 (7.60%) resulted in at least one fatality. In the 117,621 traffic accidents which did not involve pedestrians, 781 (0.66%) involved fatalities.

Pedestrian accidents were distributed fairly evenly throughout the year with the fewest (97) occurring in January; the most (140), in December. Most of the fatal accidents 80 (76.92%) occurred at night.

PEDESTRIAN CASUALTIES

1990

Action Taken by Pedestrians*

ACTION	PEDESTRIANS KILLED #	PEDESTRIANS KILLED %	PEDESTRIANS INJURED #	PEDESTRIANS INJURED %
Enter Or Crossing Specified Location	3	2.83	93	8.19
Entering Or Crossing Roadway	49	46.23	442	38.91
Entering/Crossing From Behind Vehicle	4	3.77	96	8.45
Walking With Traffic	14	13.21	82	7.22
Walking Against Traffic	5	4.72	42	3.70
Approaching Or Leaving Vehicle	1	0.94	15	1.32
Pushing Or Working On Vehicle	1	0.94	16	1.41
Working In Roadway	4	3.77	21	1.85
Standing	4	3.77	81	7.13
Playing In Roadway	1	0.94	32	2.81
Lying At Or In Location Specified	8	7.55	11	0.97
Sitting At Or In Location Specified	0	0.00	3	0.26
Other	2	1.89	35	3.08
Not Stated	10	9.44	167	14.70
TOTALS	106	100.00	1,136	100.00

Age and Sex of Pedestrians*

AGE	MALE K**	MALE I	FEMALE K	FEMALE I	TOTAL K	TOTAL I
Under 5	4	44	0	19	4	63
5-9	3	105	2	57	5	162
10-14	5	75	0	49	5	124
15-19	5	77	3	43	8	120
20-24	5	67	1	37	6	104
25-34	21	138	5	54	26	192
35-44	11	110	4	27	15	137
45-54	6	70	2	14	8	84
55-64	8	31	3	16	11	47
65-74	9	37	2	23	11	60
75 & Over	4	24	3	19	7	43
TOTALS	81	778	25	358	106	1,136

* There were 106 pedestrians killed in traffic in 1990. One driver also died, making a total of 107 persons killed in the 104 fatal accidents involving pedestrians. There were a total of 1,136 pedestrians injured in traffic accidents in 1990.

** K - Killed; I - Injured

The 25-34 age group had the most fatalities with 26. Most pedestrian fatalities were males, accounting for 81 (76.42%) of the 106 pedestrians killed in 1990. More males than females were killed in all of the eleven age categories.

TRAFFIC ACCIDENTS INVOLVING RAILWAY TRAINS

1990

Railway Train Accidents: 1986 - 1990

YEAR	TYPE ACCIDENT Fatal	Injury	PDO	Total
1986	6	39	66	111
1987	6	30	88	124
1988	9	51	66	126
1989	13	55	67	135
1990	10	39	69	118

Casualties - 1990

Persons Killed: 10

Persons Injured: 51

Railway Train Accidents by Traffic Control Device

TYPE DEVICE	TYPE ACCIDENT				PERSONS	
	Fatal	Injury	PDO	Total	Killed	Injured
Stop Sign	0	9	10	19	0	12
Stop and Go Signal	0	0	1	1	0	0
Officer/Flagman	0	0	3	3	0	0
RR Crossbucks Only	3	9	21	33	3	9
RR Flashing Lights	2	10	10	22	2	17
RR Gates & Lights	3	2	11	16	3	2
Other Sign	0	0	2	2	0	0
No Traffic Control	2	9	11	22	2	11
TOTALS	10	39	69	118	10	51

Railway Train Accidents by Light & Weather Conditions

LIGHT/WEATHER	TYPE ACCIDENT				PERSONS	
	Fatal	Injury	PDO	Total	Killed	Injured
Day and Clear/Cloudy	5	22	35	62	5	26
Dark and Clear/Cloudy	5	11	21	37	5	17
Day and Raining	0	3	6	9	0	5
Dark and Raining	0	2	6	8	0	2
Day and Other Weather	0	0	1	1	0	0
Dark and Other Weather	0	1	0	1	0	1
TOTALS	10	39	69	118	10	51

TRAFFIC ACCIDENTS INVOLVING RAILWAY TRAINS

1990 (cont.)

Railway Train Accidents By Route Category

ROUTE CATEGORY	TYPE ACCIDENT Fatal	Injury	PDO	Total	PERSONS Killed	Injured
US Primary	1	7	5	13	1	10
SC Primary	2	3	9	14	2	8
State Secondary	6	23	47	76	6	26
County	1	6	8	15	1	7
Other	0	0	0	0	0	0
TOTALS	10	39	69	118	10	51

Railway trains were involved in 118 traffic accidents in 1990. Accidents involving trains accounted for only 0.10% of all reported accidents during the year. However, 10 of these accidents resulted in fatalities, representing 1.13% of all fatal traffic accidents in 1990. These fatal accidents resulted in 10 deaths or, 1.02% of the total fatalities. The 10 accidents involving fatalities accounted for 8.47% of all railway train accidents during the year. Traffic accidents involving trains resulted in a larger proportion of fatal accidents than for any other unit type except pedestrians.

Eighty (80) of the 118 accidents, including 5 of the fatal accidents, occurred at a crossing not containing flashing light signals.

A total of 99 accidents, including all of the fatal accidents, occurred during clear or cloudy weather conditions. More than half, 62 (52.54%) occurred during the day in clear or cloudy weather. Five of the 10 fatal accidents occurred at night.

A total of 76 (64.41%) accidents involving railway trains, including 6 of the fatal accidents, occurred on state secondary highways. The remaining 42 accidents were divided fairly equally among US primary roads (13/11.02%), SC primary roads (14/11.86%) and county roads (15/12.71%).

TRAFFIC ACCIDENTS INVOLVING TRUCK TRACTORS

1990

TYPE ACCIDENT	ACCIDENTS	PERCENTAGE
Fatal	99	2.04
Injury	950	19.61
Property Damage Only (PDO)	3,795	78.35
TOTAL	4,844	100.00

Casualties

Persons Killed*: 114 Persons Injured*: 1,460

Truck Tractor Accidents by Attachment Type**

	TYPE ACCIDENT				PERSONS	
ATTACHMENT	Fatal	Injury	PDO	Total	Killed*	Injured*
None	13	135	588	736	13	204
Mobile Home	0	2	41	43	0	3
Semi-Trailer	50	610	2,487	3,147	58	916
Utility Trailer	4	24	78	106	4	37
Farm Trailer	0	2	11	13	0	3
Trailer W/Boat	0	0	7	7	0	0
Towed Motor Vehicle	0	3	9	12	0	3
Petroleum Tanker	3	23	74	100	3	39
Lowboy Trailer	3	24	70	97	3	47
Auto Carrier Trailer	1	4	17	22	1	9
Other Tanker	2	14	44	60	3	23
Flat Bed	7	45	175	227	10	69
Other	14	52	138	204	16	89
Twin Trailer	1	6	32	39	1	8
Camper Trailer	0	1	2	3	0	2
Not Stated	1	5	22	28	2	8
TOTALS	99	950	3,795	4,844	114	1,460

Truck Tractor Accidents by Light & Weather Conditions

	TYPE ACCIDENT				PERSONS	
LIGHT/WEATHER	Fatal	Injury	PDO	Total	Killed*	Injured*
Day and Clear/Cloudy	55	607	2,716	3,378	65	945
Dark and Clear/Cloudy	29	213	593	835	32	329
Day and Raining	6	78	305	389	8	103
Dark and Raining	5	27	110	142	5	44
Day and Other Weather	1	15	40	56	1	24
Dark and Other Weather	3	10	31	44	3	15
TOTALS	99	950	3,795	4,844	114	1,460

* Includes all fatalities and injuries in the accident, not just to the passengers of the truck.

** Where there was more than one truck involved in the accident, the last unit listed on the accident report is used to identify the type attachment.

TRAFFIC ACCIDENTS INVOLVING TRUCK TRACTORS

1990 (cont.)

Truck Tractor Accidents by Route Category

ROUTE CATEGORY	TYPE ACCIDENT Fatal	Injury	PDO	Total	PERSONS Killed*	Injured*
Interstate	22	222	941	1,185	26	344
US Primary	43	366	1,355	1,764	52	592
SC Primary	26	215	722	963	28	311
State Secondary	8	130	671	809	8	192
County	0	17	106	123	0	21
TOTALS	99	950	3,795	4,844	114	1,460

* Includes all fatalities and injuries in the accident, not just to the passengers of the truck.

Truck tractors were involved in 4,844 traffic accidents in 1990. A total of 5,046 individual trucks were involved in these accidents. Accidents involving truck tractors accounted for 4.07% of all reported accidents during the year. Ninety-nine (99) of these accidents involved fatalities, representing 11.19% of all fatal traffic accidents in 1990. These fatal accidents resulted in 114 fatalities, 11.60% of the total traffic fatalities. The 4,844 accidents represent a decrease of 10.71% over 1989, when truck tractors were involved in 5,425 accidents. The 99 fatal accidents are 26.92% more than the 78 reported in 1989, and the 114 fatalities are 17.53% more than the 97 reported in 1989.

In 1987, and prior years, truck tractor accidents were tabulated only for trucks with the following attachments: semi-trailer, petroleum tanker, lowboy trailer, auto carrier trailer, other tanker, flatbed, and twin trailers. In 1990, there were 3,692 accidents involving trucks with these attachments. This total included 67 fatal accidents with 79 persons killed.

The 3,147 accidents involving at least one semi-trailer accounted for 64.97% of all truck tractor accidents. Trucks with no attachment accounted for the second highest number of accidents, with 15.19% of the total.

69.74% of the truck tractor accidents occurred during the daylight hours with clear or cloudy weather including 55.56% of the fatal accidents. 35.35% (35 of 99) of the fatal accidents occurred at night.

Approximately 36.42% of all truck tractor accidents occurred on US Primary routes. 43.43% of the fatal accidents occurred on U.S. primary routes. Only 22 fatal truck tractor accidents occurred on the interstates; these accidents resulted in 26 fatalities, which represent less than 3% of the state's 983 traffic fatalities in 1990.

PART III
ACCIDENT CONSEQUENCES

The consequences of traffic accidents extend beyond those persons directly affected and are measured in both human and economic terms. The economic costs consider that portion of financial loss born by society, i.e., medical costs, property damage, lost productivity, etc.. Opposite the economic losses are the intangible human costs associated with the grief and suffering that accompany a traffic death or injury. On the following pages, statistics related to estimated economic cost, traffic injuries, fatalities and restraint usage are presented. Some of the important observations in the 1990 data are as follows:

- For the third year in a row, economic losses (adjusted for inflation) declined statewide. This was the result of fewer accidents, injuries and fatalities.
- Males accounted for 72.3% of the fatalities and 58.1% of the incapacitating injuries. Both percentages were higher than in 1989.
- A total of 335 persons under the age of 25 were killed in traffic accidents, accounting for 34.1% of the total persons killed.
- There were 2,013 occupants of automobiles and trucks totally ejected form the vehicle in which they were riding. Of these, 175 or 8.7% were killed. Of the 294,965 occupants not ejected or trapped, 346 or 0.12% were killed. The percentage of fatalities suffered by ejected occupants was **72** times that of occupants not ejected or trapped.
- Out of 5,438 children under the age of 6 involved in traffic accidents who were reported to be restrained by a federally approved child safety seat, four were killed. Of the 1,611 children under six who were not restrained in any way, seven were killed.
- Of the 242,631 occupants of automobiles and trucks who were reported restrained by a safety belt, child seat or other protective equipment, 205 were killed and 2,758 sustained incapacitating injuries. Of the reported 45,358 unrestrained occupants of these same vehicle types, 519 were killed and 2,642 sustained incapacitating injuries. For the restrained occupants, 1 out of 1,184 was killed and 1 out of 88 sustained an incapacitating injury. For unrestrained occupants, 1 out of 87 was killed and 1 in 17 sustained an incapacitating injury.

ECONOMIC LOSS BY COUNTY*
1989 and 1990

COUNTY	1989	1990
Abbeville	$ 4,600,000	$ 4,200,000
Aiken	33,400,000	36,900,000
Allendale	2,800,000	2,800,000
Anderson	37,300,000	38,500,000
Bamberg	8,000,000	3,300,000
Barnwell	3,300,000	4,000,000
Beaufort	18,300,000	17,800,000
Berkeley	28,900,000	31,800,000
Calhoun	3,200,000	6,700,000
Charleston	88,300,000	88,100,000
Cherokee	15,300,000	12,600,000
Chester	10,100,000	8,000,000
Chesterfield	12,000,000	9,300,000
Clarendon	11,000,000	8,100,000
Colleton	11,800,000	19,600,000
Darlington	26,800,000	17,200,000
Dillon	13,700,000	11,300,000
Dorchester	19,800,000	22,000,000
Edgefield	4,500,000	4,900,000
Fairfield	5,800,000	6,200,000
Florence	30,700,000	29,100,000
Georgetown	13,300,000	16,000,000
Greenville	84,300,000	83,300,000
Greenwood	14,800,000	16,000,000
Hampton	5,100,000	2,500,000
Horry	50,600,000	50,600,000
Jasper	8,600,000	9,000,000
Kershaw	10,400,000	10,700,000
Lancaster	16,700,000	14,200,000
Laurens	13,600,000	17,000,000
Lee	5,100,000	5,300,000
Lexington	40,200,000	39,900,000
McCormick	1,900,000	2,400,000
Marion	10,100,000	10,300,000
Marlboro	8,300,000	7,100,000
Newberry	7,500,000	7,500,000
Oconee	15,500,000	13,300,000
Orangeburg	28,200,000	21,100,000
Pickens	19,300,000	17,800,000
Richland	74,500,000	71,900,000
Saluda	4,600,000	4,700,000
Spartanburg	63,300,000	57,000,000
Sumter	23,400,000	19,300,000
Union	6,600,000	7,500,000
Williamsburg	14,700,000	11,200,000
York	34,500,000	35,000,000
Totals	$ 964,700,000	$ 933,000,000

All figures are rounded to the nearest $100,000.

* Based on the 1990 National Safety Council Formula which applies the following factors:

Each fatality	$290,000
Each incapacitating injury	$ 32,000
Each nonincapacitating injury	$ 8,300
Each possible injury	$ 2,600
Each property damage only accident	$ 3,000

VICTIM PROFILE

INJURIES BY AGE AND SEX - 1990

			INJURY TYPE*					
SEX	AGE	NOT INJURED	POSSIBLE	NON-INCAPACITATING	INCAPACITATING	KILLED	UNKNOWN INJURY	TOTALS
	UNDER 4	3,879	390	87	44	6	4	4,410
	4-5	2,194	196	70	36	2	0	2,498
	6-9	3,316	439	170	83	10	7	4,025
M	10-14	4,532	603	238	132	17	4	5,526
	15-24	46,684	4,780	2,251	1,357	201	23	55,296
A	25-34	33,634	3,349	1,409	1,014	179	25	39,610
	35-44	22,178	1,988	726	574	115	12	25,593
L	45-54	12,808	1,035	374	252	55	12	14,536
	55-64	8,825	666	232	160	53	4	9,940
E	65-74	6,278	493	172	128	46	4	7,121
	75+	2,871	250	104	75	25	4	3,329
	UNKNOWN	2,173	202	61	40	2	69	2,547
	SUBTOTAL	149,372	14,391	5,894	3,895	711	168	174,431
F	UNDER 4	3,916	371	57	37	7	3	4,391
	4-5	2,041	177	67	31	3	3	2,322
E	6-9	3,417	483	117	66	5	10	4,098
	10-14	4,379	691	217	92	9	7	5,395
M	15-24	31,887	4,903	1,557	852	75	19	39,293
	25-34	24,309	3,706	1,007	668	51	15	29,756
A	35-44	16,840	2,518	639	423	43	9	20,472
	45-54	9,226	1,487	392	225	24	6	11,360
L	55-64	6,657	976	258	169	18	2	8,080
	65-74	5,318	759	213	132	18	2	6,442
E	75+	2,589	360	105	83	19	4	3,160
	UNKNOWN	1,168	222	45	28	0	22	1,485
	SUBTOTAL	111,747	16,653	4,674	2,806	272	102	136,254
U	UNDER 4	10	0	0	0	0	0	10
	4-5	2	0	0	0	0	0	2
N	6-9	4	0	0	0	0	0	4
	10-14	5	0	0	0	0	0	5
K	15-24	8	1	0	0	0	0	9
	25-34	6	0	0	0	0	0	6
N	35-44	2	0	0	0	0	0	2
	45-54	1	0	0	0	0	0	1
O	55-64	0	0	0	0	0	0	0
	65-74	3	1	0	0	0	0	4
W	75+	0	0	0	0	0	0	0
	UNKNOWN	423	21	1	0	0	18	463
N	SUBTOTAL	464	23	1	0	0	18	506
TOTALS		261,583	31,067	10,569	6,701	983	288	311,191

* See Definitions for a description of each injury type.

There were a total of 311,191 persons involved in traffic accidents statewide in 1990. This represents 8.92% of the state's 3.49 million population (1990 estimate). Of this total, 261,583 (84.06%) sustained no injury. An additional 31,067 (9.98%) sustained possible injuries, the least severe type. For an additional 288, there was no injury information reported. The remaining casualties, non-incapacitating, incapacitating and fatal injuries, accounted for 18,253 (5.87%) of all persons involved.

A total of 711 (72.33%) of all fatal injuries were sustained by males. This is up from 68.9% in 1989. Overall female traffic deaths decreased from 310 in 1990 to 272 in 1989 (12.26%), while male deaths increased by 3.64%.

The pattern of male/female injuries is consistent for most age groups. For both sexes, injuries and fatalities were greatest in the 15 to 24 age category.

INJURIES BY RESTRAINT USAGE

1990[1]

RESTRAINT USAGE	NOT INJURED	INJURY TYPE POSSIBLE	NON INCAPACITATING	INCAPACITATING	KILLED	UNKNOWN INJURY	TOTALS
NO RESTRAINT USED							
NO SAFETY EQUIPMENT	6,208	1,280	563	360	61	3	8,475
LAP BELT NOT USED	7,550	1,390	532	418	69	5	9,964
LAP/SHOULDER HARNESS NOT USED	17,786	3,891	2,365	1,831	385	20	26,278
PASSIVE BELT/HARNESS NOT USED	56	21	8	5	1	0	91
CHILD/YOUTH SEAT NOT USED	387	81	38	28	3	0	537
AIR BAG NOT DEPLOYED	10	3	0	0	0	0	13
SAFETY BLANKET NOT DEPLOYED	0	0	0	0	0	0	0
SUBTOTAL	**31,997**	**6,666**	**3,506**	**2,642**	**519**	**28**	**45,358**
RESTRAINT USED							
LAP BELT USED	26,484	2,783	668	245	25	15	30,220
LAP/SHOULDER HARNESS USED	180,471	17,457	4,714	2,460	172	61	205,335
PASSIVE BELT/HARNESS USED	1,089	121	32	18	1	0	1,261
CHILD/YOUTH SEAT USED	5,201	398	60	25	5	6	5,695
AIR BAG DEPLOYED	59	20	9	10	2	0	100
SAFETY BLANKET DEPLOYED	4	0	0	0	0	0	4
SAFETY PADDING PRESENT	16	0	0	0	0	0	16
SUBTOTAL	**213,324**	**20,779**	**5,483**	**2,758**	**205**	**82**	**242,631**
UNKNOWN RESTRAINT USAGE	**10,634**	**1,661**	**435**	**277**	**55**	**102**	**13,164**
TOTALS	**255,955**	**29,106**	**9,424**	**5,677**	**779**	**212**	**301,153**

In 1990, there were a total of 301,153 automobile and truck occupants involved in traffic accidents. Of these, the restraint usage for 287,989 of the occupants was known: 242,631 were restrained and 45,358 were not restrained. In the unrestrained group, 8,475 were reported to have had no safety equipment available to them to use; the remaining 36,883 had a restraint device available to them but failed to use it. The unrestrained occupants represented only 15.1% of all reported occupants, less than half the percentage reported unrestrained in 1989. However, studies indicate that reported occupant restraint usage is higher than actual usage.[2] We should not, therefore, consider these figures as an actual reflection of restraint usage rates in South Carolina for 1990.

In the "not injured" category, 87% of the occupants with known restraint usage were restrained. For "possible" injuries 75.7% were restrained; reported restraint usage declined to 61% of the non-incapacitating injuries, 51.1% of the incapacitating injuries and finally to 28.3% of the fatal injuries. Some of this declining belt usage rate is due to improved reporting for the fatally injured occupants compared to occupants sustaining less severe injuries. Also, studies indicate persons involved in potentially fatal collisions tend to be less likely to wear a belt. Nevertheless, this data provides statistical evidence that safety equipment is useful in reducing injuries and fatalities.

---

[1] Includes occupants seated inside the passenger compartment of automobiles and trucks only.

[2] See NHTSA's A Model For Estimating Economic Savings From Increased Safety Belt Usage and South Carolina Safety Belt Study by Metromark Research.

AFTER IMPACT LOCATION - INJURIES SUSTAINED*

1990

AFTER IMPACT LOCATION	NOT INJURED	POSSIBLE	NON INCAPACITATING	INCAPACITATING	KILLED	UNKNOWN INJURY	TOTALS
	INJURY TYPE						
NOT EJECTED OR TRAPPED	252,855	28,104	8,876	4,708	346	76	294,965
TOTAL EJECTION	790	332	236	479	175	1	2,013
PARTIAL EJECTION	50	69	78	111	66	0	374
TRAPPED	25	93	143	310	182	0	753
UNKNOWN	2,235	508	91	69	10	135	3,048
TOTAL	**255,955**	**29,106**	**9,424**	**5,677**	**779**	**212**	**301,153**

INJURIES SUSTAINED BY CHILDREN UNDER SIX YEARS OF AGE - 1990**

RESTRAINT	NOT INJURED	POSSIBLE	NON INCAPACITATING	INCAPACITATING	KILLED	UNKNOWN INJURY	TOTALS
	INJURY TYPE						
CHILD SAFETY SEAT USED	4,977	376	57	21	4	3	5,438
OTHER RESTRAINT USED	5,346	380	90	31	1	1	5,849
NO RESTRAINT USED	1,228	243	82	51	7	0	1,611
UNKNOWN RESTRAINT USAGE	243	45	8	2	0	4	302
TOTALS	**11,794**	**1,044**	**237**	**105**	**12**	**8**	**13,200**

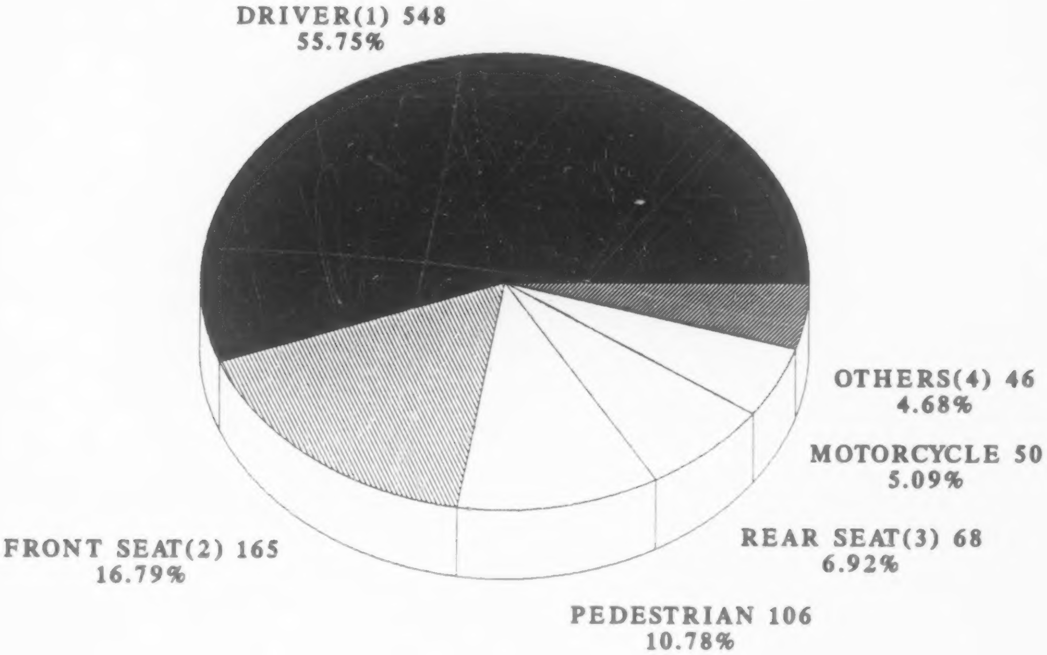
* Occupants of automobiles and trucks only.

** Includes only children seated inside the vehicle.

There were a total of 301,153 occupants of automobiles and trucks involved in traffic accidents in 1990. Most of these persons (255,955) sustained no injuries. The vast majority of these occupants (294,965/97.9%) were not ejected from nor trapped in the vehicle. Of these, 346 were killed, comprising 1 out of every 853 of these occupants. Of the 2,013 occupants totally ejected, 175 or 1 in 12 were killed. For the 753 trapped occupants, 182 or about 1 in 4 was killed.

In 1990, 13,200 children under 6 years of age were involved in traffic accidents in South Carolina. This does not include children who were either pedestrians or occupants seated outside the vehicle (such as on the hood of a car). A total of 5,438 (41.2%) were restrained by a Federally approved child safety seat. An additional 5,849 (44.3%) were restrained with a seat belt or seat belt/shoulder harness combination. These figures indicate a reported compliance rate (with the South Carolina Child Restraint Law) of approximately 85%. Of those children restrained by a child safety seat, 4 were killed. One child restrained by a belt was killed and seven unrestrained children died. The fatality rate for unrestrained children was 1 in every 230 children compared to 1 in every 1,360 in a safety seat and 1 in every 5,849 belted children.

FATALITIES BY SEATING LOCATION
1990



(1) INCLUDES DRIVERS OF ALL AUTOMOBILES, TRUCKS AND BUSES
(2) FRONT SEAT PASSENGERS OF AUTOS, TRUCKS AND BUSES
(3) REAR SEAT PASSENGERS OF AUTOS, TRUCKS AND BUSES
(4) INCLUDES BICYCLISTS, MOPED RIDERS AND PERSONS ON THE OUTSIDE OF THE VEHICLE

PART IV

ALCOHOL & DRUGS

Alcohol-related traffic accidents are responsible for a large portion of reported traffic accidents each year. The percentage of accidents which are alcohol-related increases as the severity of injuries involved increases. On the following pages accident statistics are presented which are based on the probable accident cause as determined by the officers who investigate the traffic accidents. Accidents listed by county and driver involvement are not comparable to any statistics published prior to 1988. In previous years, alcohol and drug involvement was based on a question contained in the Uniform Traffic Accident Report for each driver, "Had been drinking or using drugs". Beginning with 1988, the alcohol and drug accidents are based on the probable cause field which lists 74 causes from which the investigating officer must choose the single probable cause in the accident. Eight of these choices concern alcohol or drug usage.

The data presented here is a summary of these eight alcohol or drug-related probable causes. This data will not include any accidents where the probable cause was something other than alcohol or drugs, even if one of the drivers was intoxicated. For example, if a drunk driver runs a stop sign and this results in a traffic accident, the officer may choose to indicate "disregarding sign or signal" as the probable cause. As a result, alcohol involvement in South Carolina traffic accidents is probably understated in this data.

Despite the restrictive nature in which this data was compiled, these figures indicate alcohol and drugs are important contributors to the frequency and severity of traffic accidents. Some of the key findings in the alcohol/drug data are as follows:

- Alcohol or drug usage was the probable cause in 207 fatal accidents in 1990, resulting in the deaths of 226 persons. Both figures are up from 1989 and represent 23.4% and 23.0% respectively of all fatal accidents and persons killed during the year. These proportions are considerably higher than the 4.4% of accidents which were caused by alcohol or drugs in property damage only accidents.

- In 1990 drivers under 21 years of age accounted for 13.4% of all drivers whose age was known in accidents with a probable cause of alcohol or drugs. This is up from 12.6% in 1989.

- Blood alcohol data is compiled for drivers and pedestrians, who were over 16 years of age and died within 4 hours of a traffic accident. For 1989, the latest year for which complete data is available, 59.7% of all known test results on these victims indicated a positive blood alcohol content.

TRAFFIC ACCIDENTS IN SOUTH CAROLINA
WITH A PROBABLE CAUSE OF ALCOHOL OR DRUGS*
1990

COUNTY	NUMBER OF ACCIDENTS				NUMBER OF PERSONS	
	FATAL	INJURY	PROPERTY DAMAGE	TOTAL ACCIDENTS	KILLED	INJURED
Abbeville	0	16	22	38	0	21
Aiken	4	84	121	209	4	141
Allendale	1	9	7	17	1	19
Anderson	15	103	129	247	17	179
Bamberg	0	11	9	20	0	15
Barnwell	2	16	20	38	2	25
Beaufort	5	44	70	119	5	68
Berkeley	10	88	138	236	11	137
Calhoun	2	12	16	30	2	18
Charleston	21	290	319	630	23	469
Cherokee	2	52	66	120	2	78
Chester	6	32	33	71	6	66
Chesterfield	0	41	26	67	0	70
Clarendon	0	18	24	42	0	22
Colleton	4	32	56	92	5	44
Darlington	4	98	64	166	4	147
Dillon	2	31	32	65	2	57
Dorchester	4	50	69	123	4	86
Edgefield	2	11	9	22	2	20
Fairfield	2	23	18	43	2	40
Florence	7	100	130	237	9	164
Georgetown	2	52	61	115	2	86
Greenville	16	289	399	704	16	472
Greenwood	1	50	63	114	2	81
Hampton	0	5	19	24	0	8
Horry	14	174	247	435	17	303
Jasper	2	13	32	47	2	18
Kershaw	4	46	62	112	5	68
Lancaster	7	77	55	139	9	121
Laurens	3	59	59	121	3	99
Lee	1	18	15	34	1	24
Lexington	4	144	175	323	4	225
McCormick	0	6	12	18	0	10
Marion	1	25	42	68	1	34
Marlboro	1	20	23	44	1	32
Newberry	2	24	40	66	2	49
Oconee	3	33	59	95	3	62
Orangeburg	1	49	81	131	1	79
Pickens	3	65	115	183	3	93
Richland	4	258	317	579	4	415
Saluda	1	23	19	43	1	32
Spartanburg	21	206	270	497	22	335
Sumter	5	69	113	187	6	112
Union	3	31	38	72	3	45
Williamsburg	3	34	27	64	3	57
York	12	133	161	306	14	204
Total	**207**	**3,064**	**3,882**	**7,153**	**226**	**4,950**

* This chart is not comparable to any published statistics from 1987 and prior years.

DRIVERS INVOLVED IN ACCIDENTS WHERE THE PROBABLE CAUSE WAS ALCOHOL OR DRUGS
AGE AND SEX OF DRIVER
1990

AGE	--- TOTAL ACCIDENTS ---			-- FATAL ACCIDENTS --			-- INJURY ACCIDENTS --			PROPERTY DAMAGE ACCIDENTS		
	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE	TOTAL	MALE	FEMALE
14 & younger	8	6	2	1	0	1	3	3	0	4	3	1
15	34	20	14	0	0	0	20	10	10	14	10	4
16	110	79	31	1	0	1	52	39	13	57	40	17
17	202	158	44	7	7	0	100	80	20	95	71	24
18	290	229	61	12	12	0	136	103	33	142	114	28
19	355	276	79	8	7	1	166	132	34	181	137	44
20	324	249	75	7	6	1	170	126	44	147	117	30
21	340	270	70	9	8	1	160	125	35	171	137	34
22	336	254	82	8	6	2	154	120	34	174	128	46
23	321	268	53	8	5	3	131	110	21	182	153	29
24	380	303	77	11	7	4	174	134	40	195	162	33
25 to 29	1,832	1,390	442	50	42	8	798	595	203	984	753	231
30 to 34	1,574	1,213	361	41	34	7	721	545	176	812	634	178
35 to 39	1,219	921	298	23	17	6	517	396	121	679	508	171
40 to 44	914	708	206	26	22	4	372	280	92	516	406	110
45 to 49	542	421	121	16	14	2	213	157	56	313	250	63
50 to 54	379	298	81	11	8	3	137	101	36	231	189	42
55 to 59	261	196	65	9	9	0	101	71	30	151	116	35
60 to 64	196	161	35	6	5	1	73	59	14	117	97	20
65 to 69	148	115	33	7	6	1	53	42	11	88	67	21
70 & older	111	83	28	2	2	0	50	37	13	59	44	15
Unknown age	42	38	4	0	0	0	12	9	3	30	29	1
Unknown sex[1]	737	-	-	9	-	-	173	-	-	555	-	-
TOTALS[2]	**10,655**	**7,656**	**2,262**	**272**	**217**	**46**	**4,486**	**3,274**	**1,039**	**5,897**	**4,165**	**1,177**

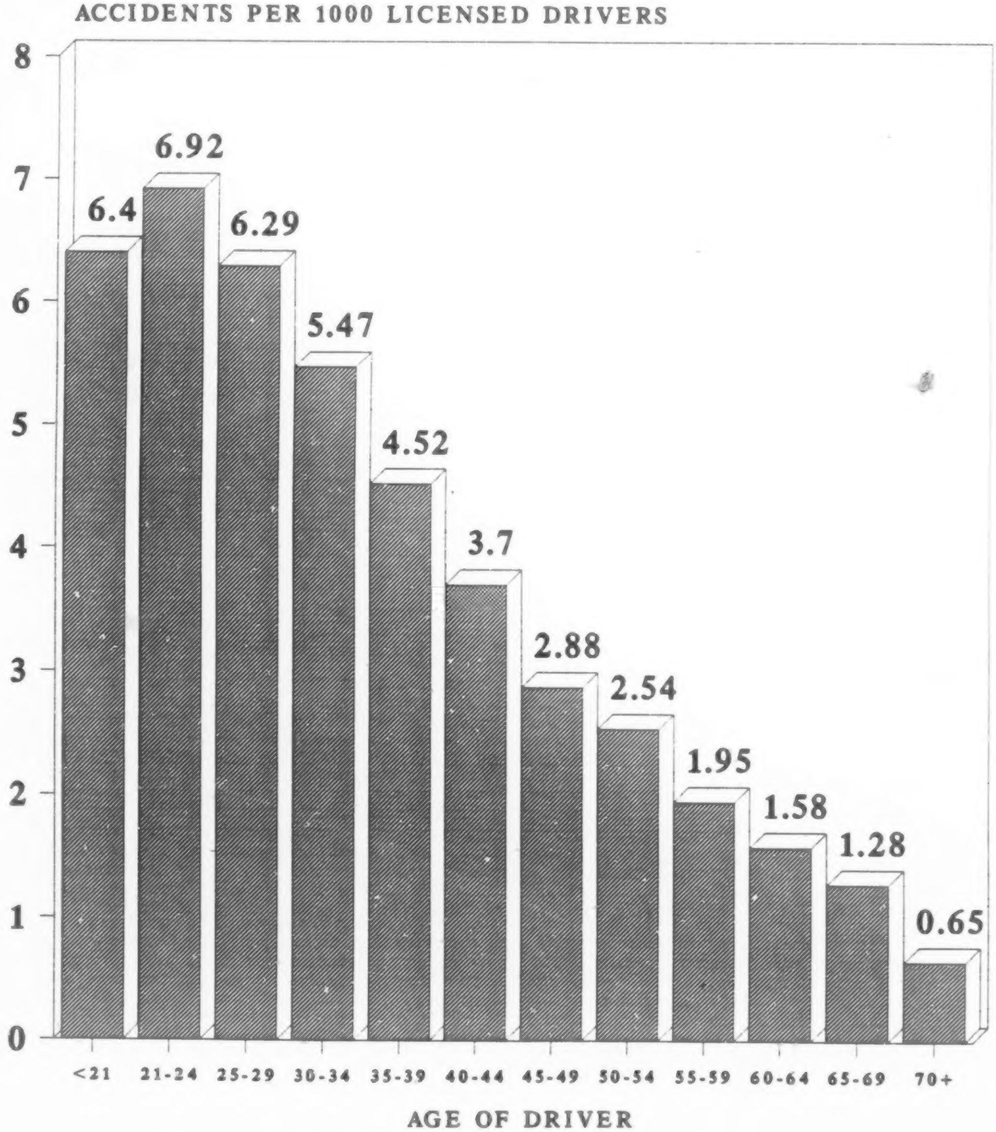
---

[1] - Includes drivers whose sex was not recorded on the report, plus hit and run accidents for which driver information was not determined; also includes parked cars with no driver.

[2] - Adding male, female and unknown sex, totals will equal the total for all drivers.

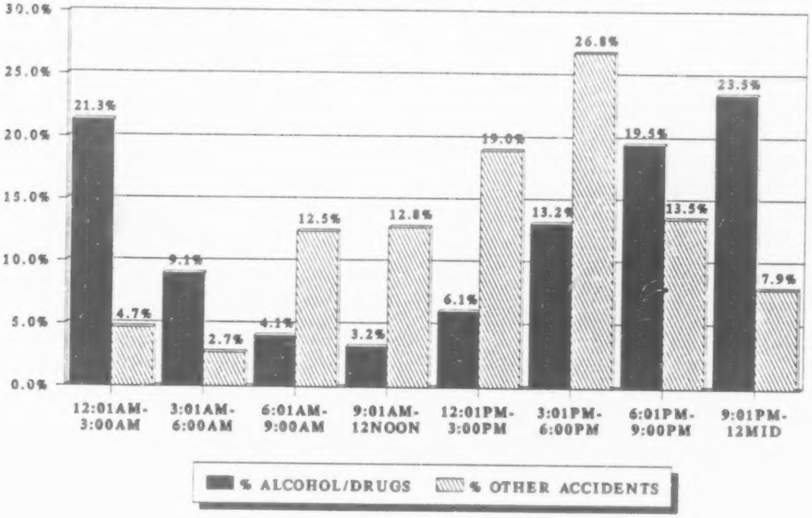
Out of the 10,655 drivers involved in accidents where the probable accident cause was alcohol or drugs and whose gender was known, 77.2% were males. A total of 1,323 (12.4% of the total) drivers were under the age of 21. In fatal accidents males comprised 82.5% of all known drivers. There were 36 drivers (13.2%) under age 21 involved in fatal accidents. Male drivers between 21 and 34 years of age accounted for 34.7% of the drivers involved in accidents with a probable cause of alcohol or drugs but comprised only 21.9% of the drivers in all accidents and 16.1% of the state's licensed drivers in 1990. Moreover, for fatal accidents with an alcohol/drug probable cause, male drivers age 21 to 34 accounted for 38.7% of the known drivers.

DRIVERS INVOLVED IN TRAFFIC ACCIDENTS
PROBABLE CAUSE: ALCOHOL OR DRUGS
1990



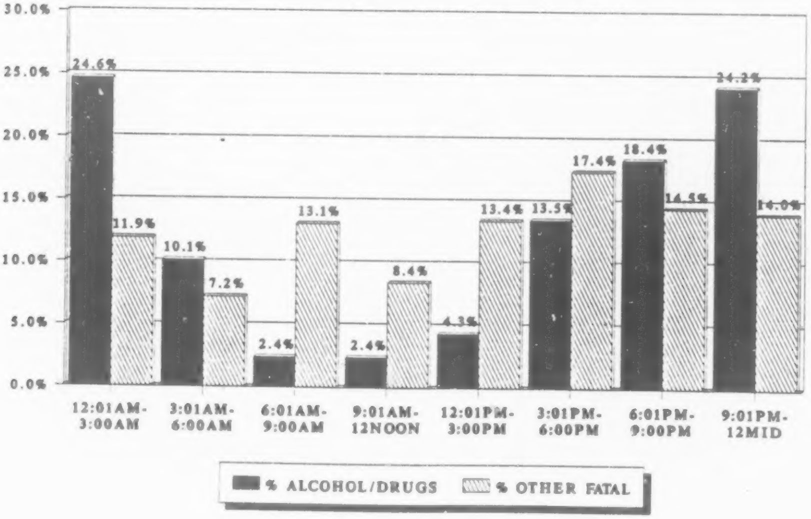
ALCOHOL/DRUG RELATED ACCIDENTS VERSUS *ALL* OTHER ACCIDENTS BY TIME OF DAY

1990

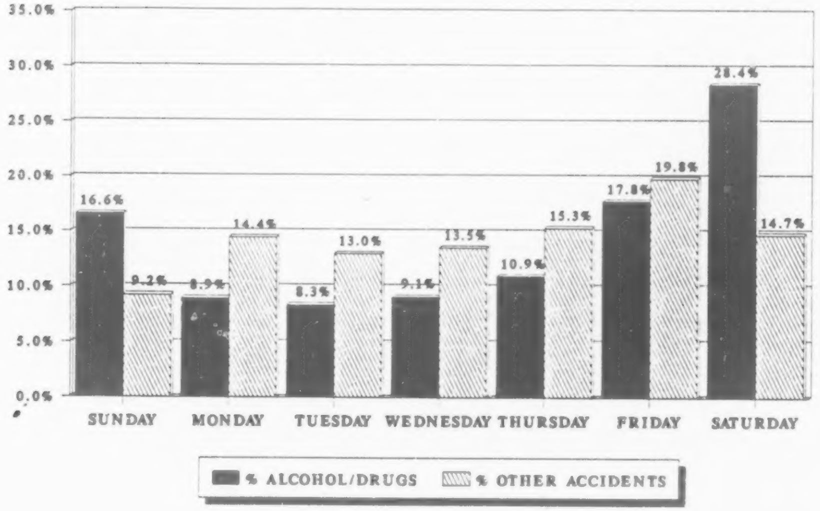


ALCOHOL/DRUG RELATED ACCIDENTS VERSUS ALL OTHER *FATAL* ACCIDENTS BY TIME OF DAY

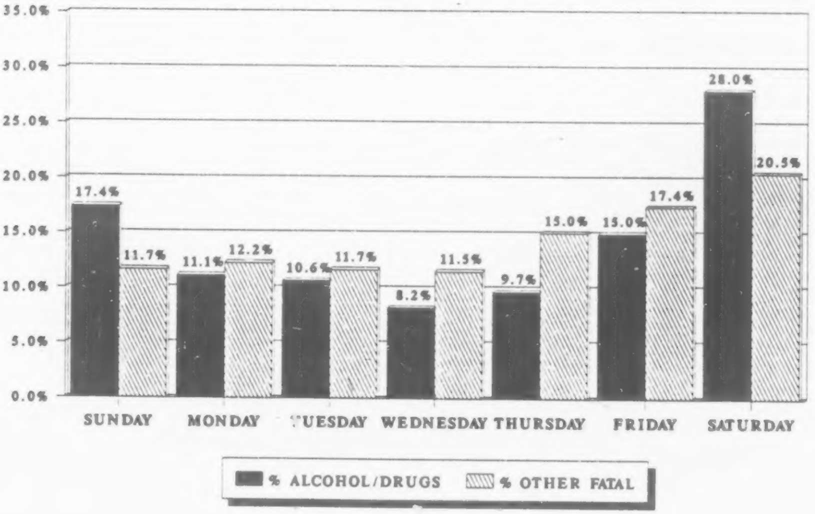
1990



ALCOHOL/DRUG RELATED ACCIDENTS VERSUS
ALL OTHER ACCIDENTS BY DAY OF WEEK
1990



ALCOHOL/DRUG RELATED ACCIDENTS VERSUS
ALL OTHER *FATAL* ACCIDENTS BY DAY OF WEEK
1990

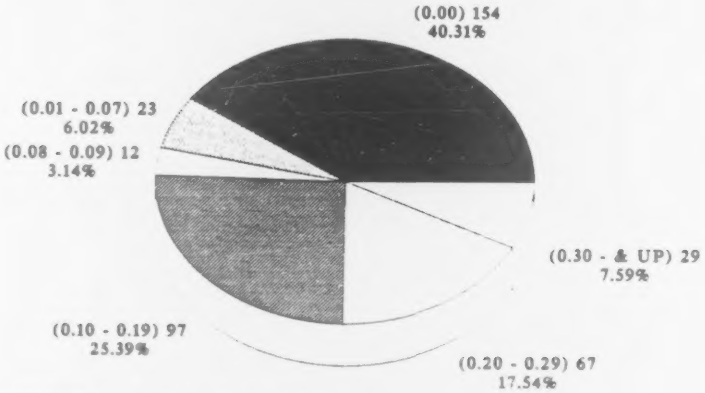


BLOOD ALCOHOL LEVELS (BAC)
DRIVERS AND PEDESTRIANS IN FATAL ACCIDENTS*
1989

	BAC LEVELS						
COUNTY	0.00	0.01–0.07	0.08–0.09	0.10–0.19	0.20–0.29	0.30 AND UP	TOTAL TESTED
Abbeville	1	1	0	1	1	0	4
Aiken	5	0	0	4	7	3	19
Allendale	0	0	0	0	1	0	1
Anderson	10	1	1	7	6	1	26
Bamberg	4	0	0	1	0	0	5
Barnwell	0	0	1	0	0	0	1
Beaufort	0	1	1	1	2	1	6
Berkeley	4	1	0	2	0	1	8
Calhoun	0	0	0	0	1	0	1
Charleston	7	1	1	5	4	4	22
Cherokee	3	1	0	1	1	0	6
Chester	0	0	0	4	1	2	7
Chesterfield	0	1	1	1	0	1	4
Clarendon	3	0	0	0	1	0	4
Colleton	2	0	0	0	1	0	3
Darlington	8	1	0	7	4	1	21
Dillon	3	0	0	0	0	2	5
Dorchester	3	0	0	2	1	1	7
Edgefield	0	0	0	0	0	0	0
Fairfield	1	0	0	0	0	0	1
Florence	4	0	0	8	0	1	13
Georgetown	4	0	1	2	0	0	7
Greenville	27	1	1	13	7	0	49
Greenwood	2	0	0	0	1	0	3
Hampton	1	0	1	2	0	0	4
Horry	6	2	2	4	1	3	18
Jasper	1	2	0	2	2	0	7
Kershaw	1	1	0	1	0	0	3
Lancaster	1	0	0	2	0	0	3
Laurens	2	1	0	0	1	2	6
Lee	4	0	0	3	0	0	7
Lexington	2	1	0	6	1	0	10
McCormick	1	0	0	0	0	0	1
Marion	2	0	0	1	2	0	5
Marlboro	7	1	0	0	1	0	9
Newberry	0	0	0	0	0	0	0
Oconee	3	0	0	0	5	0	8
Orangeburg	4	2	0	1	1	1	9
Pickens	4	0	0	2	0	0	6
Richland	8	3	2	2	1	2	18
Saluda	0	0	0	0	0	0	0
Spartanburg	12	1	0	7	7	2	29
Sumter	1	0	0	0	0	0	1
Union	0	0	0	0	1	1	2
Williamsburg	2	0	0	2	2	0	6
York	1	0	0	3	3	0	7
Total	**154**	**23**	**12**	**97**	**67**	**29**	**382**

* Includes only drivers and pedestrians 16 years of age and older who died within 4 hours of the accident. Only BAC levels for known test results are included. No test results for surviving drivers are included. 1989 is the latest year in which this data is available. The information is provided by the state's coroners, in cooperation with State Law Enforcement Division.

BLOOD ALCOHOL LEVELS*
1989



*Includes known test results for drivers and pedestrians 16 yrs. of age and older who died within 4 hrs. of the accident.

In South Carolina, it is inferred that you are under the influence when your Blood Alcohol Concentration (BAC) is at a level of 0.10 percent. At this level, you are seven times more likely to have an automobile accident than if your BAC were zero (0.00). If your BAC reaches 0.15 percent, your chances of having an accident are 25 times greater.

BAC Levels	Common Effects
0.03	Mild alteration of feelings. Level of impairment is not generally too serious.
0.05	Feelings of relaxation, sedation and/or euphoria. Increased difficulty in performing motor skills. Driving ability and judgement impaired.
0.10	Physical and mental impairment affecting perception and performance. Deterioration in motor coordination. Hearing and speech impaired. Uncoordinated behavior. Legally inferred to be under the influence in South Carolina.
0.15	Serious impairment of physical and mental functioning. Irresponsible behavior. Distorted perception and judgement. Difficulty in standing, walking, and talking.
0.40	Coma results. The person cannot be awakened.
0.60	Death can result from alcohol overdose or accidental choking. At high BAC level, absorption of alcohol continues at a constant rate while oxidation slows because the high BAC causes anesthetization of the heart and lungs. Death occurs when the respiratory and circulatory systems cease to function.

As indicated on the previous page, state law requires that each of the 46 coroners draw blood samples from all drivers and pedestrians over 16 years of age who die within four hours from injuries sustained in a traffic accident. The graph above shows the blood alcohol levels for the 382 drivers and pedestrians meeting these criteria and whose results were determined by a qualified testing lab.

DEFINITIONS*

Alcohol Related Motor Vehicle Accident - Any accident in which either a driver or a non-occupant (such as a pedestrian) had a measurable or estimated blood alcohol concentration (BAC) of .01 percent or above.

Driver - An occupant who is in actual physical control of a transport vehicle, or for an out-of-control vehicle, an occupant who was in control until control was lost.

Driver Intention - What the driver intended to do just prior to the first harmful event and before executing an evasive maneuver.

Fatal Injury - Any injury that results in death.

First Harmful Event - The first event in a traffic accident to result in injury or damage.

Harmful Event - An occurrence of injury or damage.

Incapacitating Injury - Any injury, other than a fatal injury, which prevents the injured person from walking, driving or normally continuing the activities he was capable of performing before the injury occurred.

Junction - Either an Intersection or the connection between a driveway access and a roadway other than a driveway access.

Injury - Bodily harm to a person.

Moped** - A moped is a speed-limited motor-driven cycle which may be propelled by pedaling.

Motor Vehicle - Any motorized (mechanically or electrically powered) road vehicle not operated on rails.

Motor Vehicle Accident - A transport accident that (1) involves a motor vehicle in transport, (2) is not an aircraft accident or watercraft accident and (3) does not include any harmful event involving a railway train in transport prior to involvement of a motor vehicle in transport.

Non-Incapacitating Evident Injury - Any injury, other than a fatal injury or incapacitating injury, which is evident to observers at the scene of the accident in which the injury occurred.

Nonjunction - A nonjunction is anything that is not an intersection or the connection between a driveway access and a roadway other than a driveway access.

Occupant - Any person who is part of a transport vehicle.

Pedalcyclist - Any occupant of a pedalcycle in transport.

Pedestrian - Any person who is not an occupant.

Possible Injury - Any injury which is reported or claimed which is not a fatal injury, incapacitating injury or non-incapacitating injury.

Probable Cause - The cause or factor which created the accident situation.

Rural Area - Any area which is not within urban areas.

Traffic Accident - A road vehicle accident in which (1) the unstabilized situation originates on a traffic way or (2) a harmful event occurs on a traffic way.

Traffic Unit - A traffic unit is a road vehicle or pedestrian.

Truck Tractor - A truck tractor is a motor vehicle consisting of a single motorized transport device designed primarily for drawing trailers.

Urban Area - An area whose boundaries shall be fixed by responsible state and local officials in cooperation with each other and approved by the Federal Highway Administration. Such boundaries are established in accordance with the provisions of Title 23 of the United States Code.

---

* Source: National Safety Council, Manual on Classification of Motor Vehicle Traffic Accidents, Fifth Edition.

** - A moped is defined in the South Carolina Code of Laws, Section 56-5-165 (1986). In part, this specifies that the "... motor is not to exceed fifty cubic centimeters and produce not more than one and one-half brake horsepower".

Index

- **Alcohol/Drugs, Accidents with Probable Cause of** 12,79-83
  - Age of Drivers, in 80-81
  - By County - All, Fatal and Injury Accidents 79
  - Sex of Drivers 80
- Versus Other All/Fatal by Time/Day 82-83
- Alcohol, Blood Alcohol Levels - 1989 Accidents 84-85
- Bicycle Accidents 62-63
- Child Safety Seats, Injuries to Occupants Seated in 75-76
- County, All, Injury and Fatal Accidents 38
- Day of Week, All and Fatal Accidents 27,29
- **Drivers**
  - Intentions of 22-23
  - Licensed by Age and Sex 21
  - Number Licensed in South Carolina 5,9,20
  - Out-of-State Drivers in South Carolina Accidents 24
  - Traffic Accidents by Age and Sex 21
  - Violations by, in All Accidents 19
- Drugs, Accidents with Probable Cause of ..... See Alcohol
- **Economic Loss From Motor Vehicle Accidents**
  - By County 73
  - Statewide 5,9,73
- **Fatal Accidents** 5
  - Alcohol/Drugs as the Probable Cause, by County 79
  - Bicycle 62-63
  - Age and Sex of Driver 21
  - County, Summary of 38
  - First Harmful Event in 15-17
  - By Month 28-29
  - Mopeds 60-61
  - Motorcycles 57-59
  - Pedestrians 66-67
  - Probable Cause in 12-14
  - School Bus 64-65
  - By Time of Day 26,29
  - Truck Tractors 70-71
  - Trains 68-69
- **Fatalities in Traffic Accidents** 5,9,10,74
  - By County 38
  - By First Harmful Event 15
  - By Highway District 37
  - On Selected Holidays 30-31
  - By Jurisdiction 40-45
  - By Probable Cause 12
  - (See Fatal Accidents for Fatalities in Accidents Involving Specific Unit Types)
- **First Harmful Event - All, Injury and Fatal Accidents** 15-17
  - Definition of 86
- Highway Districts - Fatalities in 37
- Holidays - Fatal Accidents and Persons Killed 30-31
- **Injury Accidents** 5
  - Age and Sex of Driver in 21
  - Alcohol/Drugs as the Probable Cause, by County 79

Index

  - Bicycle 62
  - By County 38
- **First Harmful Event in** 15
  - Jurisdiction 40-45
  - Moped 60-61
  - Motorcycle 57-59
  - Pedestrians 66-67
  - Probable Cause in 12
  - School Bus 64-65
  - Trains 68-69
  - Truck Tractors 70-71
- **Injuries** 5,9,10,74
  - By Age and Sex 74
  - By Jurisdiction 40-45
  - By County 38
  - By First Harmful Event 15
  - By Probable Cause 12
  - By Severity 74
  - (See Injury Accidents for Injuries Involving Specific Unit Types)
- Licensed Drivers - by Age and Sex 20
- Light Conditions, All and Fatal Accidents 50
- Locale, All Accidents 48
- Mileage Death Rate, US and SC 11
- Month - All and Fatal Accidents 28
- Moped Accidents 60-61
- Motorcycle Accidents 57-59
- **Motor Vehicles**
  - Accidents by Type Unit 54
  - Definition of 86
  - Registrations by County 53
- Pedestrians Involved in Traffic Accidents 66-67
- **Population**
  - All Accidents per 1,000 Population (by County) 36
  - Fatal Accidents per 100,000 Population (by County) 36
- Probable Cause, All, Injury and Fatal Accidents 12-13
- Restraints, Injuries by Usage 75
- Road Character, All and Fatal Accidents 51
- Road Defect, All and Fatal Accidents 51
- Rural Traffic Accidents, All and Fatal 35
- Safety Belts (See Restraints)
- School Bus Accidents 64-65
- Surface Conditions, All and Fatal Accidents 49
- Time of Day, All and Fatal Accidents 26
- Truck Tractor Accidents 70-71
- Traffic Control, All and Fatal Accidents 50
- Trains, Traffic Accidents Involving 68-69
- Urban Traffic Accidents, All and Fatal 35
- Uniform Traffic Accident Report (Form TR-310) 6-8
- Vehicle Miles of Travel 5,9,10
- Violations, by Drivers Involved in Traffic Accidents 19
- Weather, All and Fatal Accidents 49
- Work Zones, Traffic Accidents Occurring In 47,51

Acknowledgments

The Highway Safety Office of the South Carolina Department of Highways and Public Transportation would like to take this opportunity to express sincere appreciation to all persons, agencies, departments and organizations who have contributed to this publication.

The vast majority of the data used to produce this publication was tabulated from the Uniform Traffic Accident Reports for Investigating Officers. These reports were submitted by members of the South Carolina Highway Patrol, City Police Departments, County Police Agencies, and various other Law Enforcement Agencies.

The Highway Safety Office gives special recognition to the above traffic investigative agencies, and in doing so, cannot forget the support and cooperation of the following organizations within the Department of Highways and Public Transportation: Engineering Division, Division of Motor Vehicles, Public Affairs Office and the Data Processing Office.

The Highway Safety Office, which tabulated the traffic accident data and other pertinent information for this publication, could not have done so without the untiring efforts of the above persons and organizations.